Intelli-Net

Central Scale Control Software Version 5.0

User's Guide

D14020200A
01/97

METTLER TOLEDO

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INTRODUCTION

This publication is provided solely as a guide for individuals who have received Technical Training in servicing the METTLER TOLEDO product.

Information regarding METTLER TOLEDO Technical Training may be obtained by writing to:

METTLER TOLEDO
350 W. Wilson Bridge Road
Worthington, Ohio 43085
(614) 438-4511

WARNING!

This equipment generates, uses, and can radiate radio frequency energy and if not installed and used properly, i.e., in accordance with the instructions manual, may cause harmful interference to radio communications. It has been tested and found to comply with the limits for a Class A computing device pursuant to Subpart J of Part 15 of FCC Rules, which are designed to provide reasonable protection against such interference when operated in a commercial environment. Operation of this equipment in a residential area is likely to cause interference which case the user at his own expense will be required to take whatever measures may be required to correct the interference.

METTLER TOLEDO RESERVES THE RIGHT TO MAKE REFINEMENTS OR CHANGES WITHOUT NOTICE.

PRECAUTIONS

READ this manual BEFORE operating or servicing this equipment.

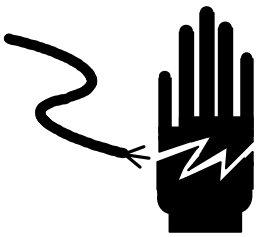
FOLLOW these instructions carefully.

SAVE this manual for future reference.

DO NOT allow untrained personnel to operate, clean, inspect, maintain, service, or tamper with this equipment.

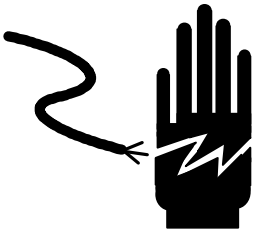
ALWAYS DISCONNECT this equipment from the power source before cleaning or performing maintenance.

CALL METTLER TOLEDO for parts, information, and service.



WARNING

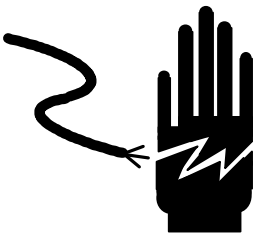
ONLY PERMIT QUALIFIED PERSONNEL TO SERVICE THIS EQUIPMENT. EXERCISE CARE WHEN MAKING CHECKS, TESTS AND ADJUSTMENTS THAT MUST BE MADE WITH POWER ON. FAILING TO OBSERVE THESE PRECAUTIONS CAN RESULT IN BODILY HARM.



WARNING

FOR CONTINUED PROTECTION AGAINST SHOCK HAZARD CONNECT TO PROPERLY GROUNDED OUTLET ONLY.

DO NOT REMOVE THE GROUND PRONG.



WARNING

DISCONNECT ALL POWER TO THIS UNIT BEFORE REMOVING THE FUSE OR SERVICING.

CAUTION

BEFORE CONNECTING/DISCONNECTING ANY INTERNAL ELECTRONIC COMPONENTS OR INTERCONNECTING WIRING BETWEEN ELECTRONIC EQUIPMENT ALWAYS REMOVE POWER AND WAIT AT LEAST THIRTY (30) SECONDS BEFORE ANY CONNECTIONS OR DISCONNECTIONS ARE MADE. FAILURE TO OBSERVE THESE PRECAUTIONS COULD RESULT IN DAMAGE TO OR DESTRUCTION OF THE EQUIPMENT OR BODILY HARM.

CAUTION

OBSERVE PRECAUTIONS FOR HANDLING ELECTROSTATIC SENSITIVE DEVICES.

METTLER TOLEDO
Scales & Systems
350 West Wilson Bridge Road
Worthington, Ohio 43085-2273

P/N: D14020200A

(01/97)

D14020200A

Table of Contents

1

Introduction

Intelli-Net is a central scale control software package that provides management of METTLER TOLEDO Scale/Printer PLU (Price Look Up), Nutrition Facts and Extra Text Files, Communication to METTLER TOLEDO programmable scales and METTLER TOLEDO printers, and collection and reporting of data. **Intelli-Net** is designed to run on the IBM™ PC or IBM compatibles using MS-DOS operating systems. **Intelli-Net** can be used on a stand alone PC or on approved PC network applications.

Communication

Intelli-Net can communicate with an in-store scale network and to remote stores using a Hayes™ Compatible Modem. The IBM™ PC or IBM compatibles must meet minimum hardware and software requirements to run the Intelli-Net software package. See system requirements for more details.

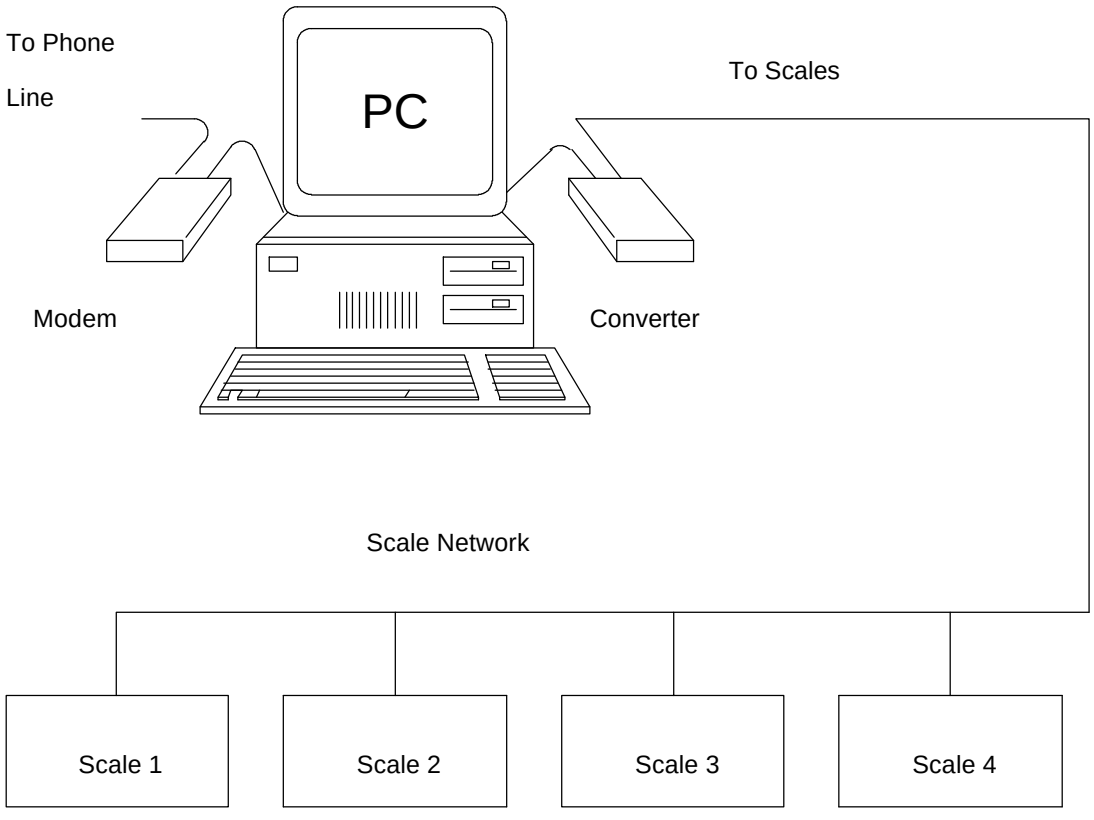


Figure 1: An example of a typical Intelli-Net System using an instore scale network, and a modem to communicate with remote stores

Figure 1

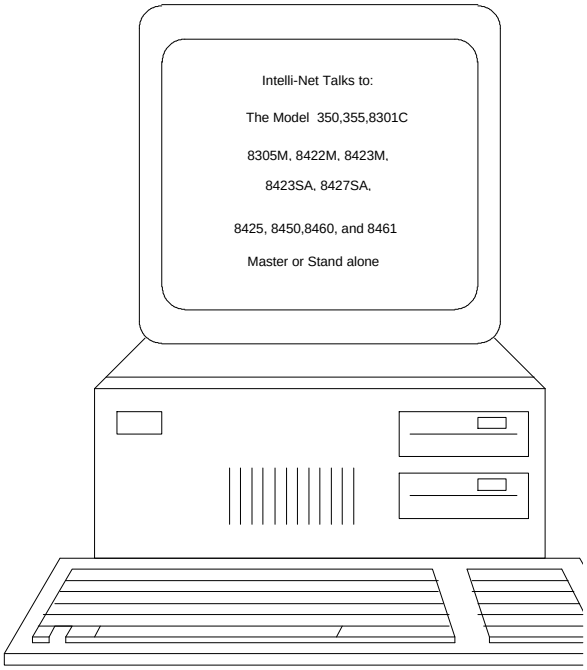
License Agreement

Intelli-Net software uses an authorization key that must be present on the PC's parallel port before all Intelli-Net functions can be accessed. After installing **Intelli-Net**, always keep the original program disk in a safe place. Review the Software License Agreement printed on the program disk envelope and in the License/Warranty Section of this manual. This agreement contains information regarding copying of software and site licenses.

Functions

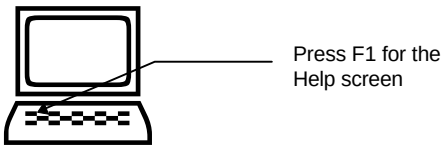
Intelli-Net uses multiple screens with major functions grouped in specialized menus. Figure 1-2 shows the different scales and printers that can be connected to **Intelli-Net**. Many new functions have been added to make it more flexible and versatile.

Chapter 2, Getting Started, covers installation, upgrading, hardware and software requirements. Chapter 3, Learning Intelli-Net, will give an overview of how the PC communicates with the scales and will explain the different scale types that may be connected to the **Intelli-Net** scale network. After installion is complete on the **Intelli-Net** system, Chapter 4, Using Intelli-Net, is a reference section that covers all of the various **Intelli-Net** menu functions. Chapter 4 is indexed in the same order as the main menu and sub-menu's.



Help Screen

Context Sensitive Help is always available simply by pressing the F1 key on the computer keyboard.



2 Getting Started

First Steps

Check Your Intelli-Net Package

If any items are missing from the package please contact your local Mettler Toledo Representative.

First check your **Intelli-Net** package to make sure you have the following items:

- **Intelli-Net** User's Guide
- Software Registration Card
- "Important Information" Card
- Program Access Key -Not included in upgrade Kit.
- **Intelli-Net** Program Diskette Envelope containing 3.5 diskette.

Software Registration Card

The **Intelli-Net** Software Registration Card supplied with the software must be returned to validate your warranty and license. This card registers you as a licensed user and validates your technical support. Be sure to fill in the serial number found on the program disk.

Upgrading From Early PCS and Intelli-Net Versions

Intelli-Net 3.0, Intelli-Net 4.0, Intelli-Net 4.1, **Intelli-Net 4.2**, PCS-III, PCS-II Version 1, PCS-II Version 2, or PCS-350 Version 1.1, refer to upgrading in this chapter.

Intelli-Net 5.0 Software Registration Card supplied must be returned to validate your warranty and license. This card registers you as a licensed user and validates your technical support. Be sure to fill in the serial number found on the program

System Requirements

PC hardware requirements for use with Intelli-Net are as follows (see Note 1):

- PC compatible using a 386/486™ / Pentium CPU.(A 386 CPU can be used although a faster CPU is recommended.)
- 640 k Ram Memory (minimum, with at least 480 k free Conventional RAM.)
- Floppy Disk Drive, 3.5" 1.44 MB
- Hard Disk or Network Drive.
- Color Monitor or SVGA color monitor.
- Printer Parallel Port (required for key and printer)
- Parallel Printer (required to print reports).
- Serial RS-232 Interface Port (COM Port).
- Hayes™ or Hayes Compatible Modem (If Intelli-Net is to be used remotely)
- 1200-28800 Baud, Required for remote store communication;

PC Software

In order to run **Intelli-Net**, your PC must have MS-DOS™ release 5.0 or higher. Installing **Intelli-Net** will require basic knowledge and use of DOS. If installing on a PC network, network supervisor access is required. Consult your DOS manual or a PC Specialist.

Scale Interface and Hardware

Up to 24 METTLER TOLEDO Scales (Models: 350, 355, 8301C, 8305M, 8422M, 8423SA, 8423M, 8425, 8427SA, 8450, 8460M, 8461) can be connected to the PC network, **per store**. Refer to the Hardware Guide in this manual, for interconnecting hardware and accessories that may be required to connect your equipment to the Intelli-Net Network. Single METTLER TOLEDO Scale Type-4 models 8422M, 8423M, 8423SA, and 8305M and Type 9 models 8450SA, and 8460M use standard RS232 and can be connected directly to the PC's RS232 serial port (up to 100 feet cable length). If you are using any of the other scale types, the 8427SA, or if using multiple scale masters or stand alones, an additional converter will be needed to convert the single device RS232 interface to Multidrop RS422. Mettler Toledo does not recommend over a 1500ft maximum cable run.

Disk Space Requirements

Your hard disk or network drive will store both the **Intelli-Net** program files and various data files. Many of the data files will vary in size depending upon your system configuration and the quantity of PLU and Extra Text Files.

The following table is a guide for approximating the amount of hard disk space that may be required for the **Intelli-Net** program.

FILE TYPES	APPROX DISK SPACE REQUIRED
Program Files	2 mb
Data Files	350 kb/100 PLU Records and Temp Work Space

Network (LAN) Compatibility

Intelli-Net is a single simultaneous user program and can be installed on the following PC Local Area Networks (LAN):

- IBM PC Network
- IBM Token Ring
- IBM NETBIOS-compatible networks
- AT&T Starlan
- Banyan Vines
- 3-Com Corp.
- Digital Equipment Corp.
- Novell, Inc.

Intelli-Net will not run on Lantastic™ or similar peer-to-peer networks of this type.

When installing on a network, you must be logged in as a supervisor or with equivalent supervisor rights. To run the program **Intelli-Net** users must have a minimum access of READ, WRITE, OPEN, SEARCH, and DELETE for the **Intelli-Net** subdirectory.

Installing Intelli-Net

Read the software license agreement before breaking the seal and opening the program disk envelope. If you have an existing PCS version or **Intelli-Net 3.0** installed on your hard disk drive, refer to the section on upgrading to **Intelli-Net 5.0.** Additional steps are required to convert the data files to the new format used by **Intelli-Net**. Prior to installing **Intelli-Net**, ***there are three conditions that must be met on your PC:***

1. If you are installing **Intelli-Net** on a network, you must be logged on as a supervisor or supervisor equivalent, or have sufficient rights to install the program in the specified subdirectory.
2. There must be a file named CONFIG.SYS located in the Root Directory of the PC's boot-up drive. This file must contain the statement **FILES=XX** (where XX = 40 or higher.) The statement sets the limit on the number of files that can be open at one time. The value of 40 is a minimum value required by **Intelli-Net.** Additional information can be found in the CONFIG.SYS file section of this chapter.
3. A path statement must be present in your AUTOEXEC.BAT file reflecting the path to the DOS files BACKUP.COM and RESTORE.COM. When using **Intelli-Net** on a network drive, you must have a search mapping to the DOS subdirectory location. Additional information can be found in the AUTOEXEC.BAT file section of this chapter.

CONFIG.SYS File

The CONFIG.SYS file is a configuration file that DOS reads only upon power-up or after a "warm boot" (using CTRL-ALT-DEL to reset the PC). This file must be located in the Root Directory of the PC's boot-up drive. **Intelli-Net** requires the statement **FILES=40** to be included in this file. This statement sets the maximum number of files that DOS can have open at one time. Other programs may also require this statement, and may also require a higher value. If the FILES= value is set too low, an Error 4 may be reported. In this case use a higher value in the CONFIG.SYS file and reboot the machine before retrying.

To reboot a PC, either turn the power switch to OFF, then back to ON, or press the Ctrl (Control), the Alt (Alternate), and the Del (Delete) keys at the same time.

If **Intelli-Net** is run on a PC Network Workstation, the **CONFIG.SYS** file must be reside on the workstation's **boot-up** drive. After creating (or modifying) the CONFIG.SYS file, re-boot the computer. This file is **only** read while the computer is booting up.

If the **CONFIG.SYS** file does not exist on the PC's bootup drive, or if it contains an incorrect value, or if it is incorrectly typed, an error message will displayed in the Intelli-Net program whenever DOS attempts to open a new file with insufficient file allocation space. The typical **Intelli-Net** error message for this type of error will be **"Error 4 - Too many open files".**

Path and Search Mappings

The **path** statement tells DOS where to find files. A path statement is required in order for **Intelli-Net** to access the DOS Backup and Restore functions. The path statement should be included in your PC's AUTOEXEC.BAT file so it automatically sets the path every time the PC is booted up. If your PC has an existing AUTOEXEC.BAT file, you can read the contents of the file by using the DOS **TYPE** command. (Ex: TYPE CONFIG.SYS) A common path statement would look like this:

PATH = C:\;C:\DOS

If you are installing **Intelli-Net** on a network drive such as Novell Netware®, for example, the **path** is replaced by a **search mapping** to a logical drive when you log in to the network. If you are automatically assigned a "search mapping" to the location of **COMMAND.COM** (COMSPEC) and to the correct DOS subdirectory, you do not have to include the path statement in your AUTOEXEC.BAT file.

Installation Procedure Using SETUP Program

If installing Intelli-NET on a network drive, you must be logged in as a supervisor or equivalent, or you must have sufficient rights in order to install the program in the specified subdirectory.

For the following installation procedure, we will use an example subdirectory named **INET** located on drive **C**. If you will be installing **Intelli-Net** onto a network drive, use one of the logical drives (F-Z) for the target drive.

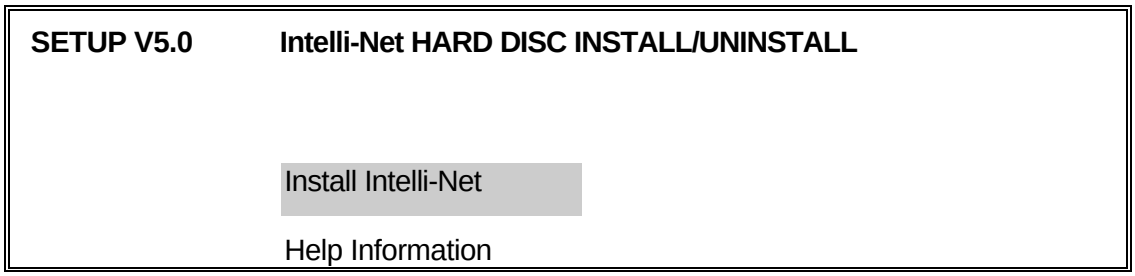
First, insert the **Intelli-Net** program disk in your floppy drive and make the floppy your source default drive by typing:

TYPE:	A:	(or B: if using a different floppy drive.)
PRESS:	[ENTER]	

Next type in **SETUP** then press **ENTER**, as follows:

TYPE:	**SETUP**
PRESS:	[ENTER]

The following Main Menu will be displayed:



Program Info

Exit Setup

Use Cursor Up/Down Keys To Highlight Menu Selection Then Press ENTER To Select

METTLER-TOLEDO 1996

To install **Intelli-Net**, highlight **Install Intelli-Net**, then press **ENTER**. **ESC** can be used to abort the installation at any time. You will first supply the source floppy drive.

Enter Source Floppy Drive (A/B):

Next supply the target hard disk or network drive letter.

Enter Target Drive to Install Intelli-Net (C-Z):

Type in the letter of the local or network hard disk drive where Intelli-Net will be installed. Next, type in the subdirectory path for the **Intelli-Net** program files. The subdirectory can be a new or existing subdirectory. The subdirectory may be any name up to eight characters, except the following reserved characters: * / \ . , : ; " ' | < >.

When installing **Intelli-Net** on a PC network drive, the subdirectory can be a nested subdirectory several levels deep, for example: **\PUBLIC\TOLEDO\INET**.

If any version of Intelli-Net is currently installed, use a different subdirectory for the new **Intelli-Net** and refer to the Upgrading section later in this chapter for conversion information.

If version of Intelli-Net is used refer to Upgrading section is this chapter.

Type in the full path (except drive letter and first backslash) at the prompt as follows:

Type in Full Path of Target Directory: *\INET*

If mistake is made, an error indicating an invalid path was typed in will be displayed.

A prompt will be displayed asking if “the entry is an existing subdirectory?”

Press **Y** if the subdirectory currently exists, or **N** if entry will be a new subdirectory. If the answer **N**, a prompt will be displayed to create a new **SETUP** subdirectory. Press **Y** to create the subdirectory, or **N** to abort the procedure. If **Y** is selected to create the subdirectory, **SETUP** will display a

message indicating the new subdirectory was successfully created. The source and target drives will then be validated as follows:

Source Drive = A:

Target Drive/Subdirectory = C:\INET

Continue Installation (Y/N)? _

Press **Y** to continue the installation procedure, or **N** to abort. Pressing **N** will return to the main menu. Pressing **Y** will display the following message:

Installing Intelli-Net To C:\INET

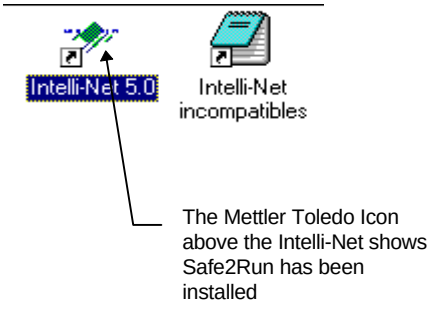
Please Wait.....

SETUP will copy the support and program files to the specified target subdirectory. When installation is complete, a short message will be displayed and then returned to the DOS prompt. At this time, installation is complete. Remove the program diskette from the floppy drive and store the original diskette in a safe place for future use.

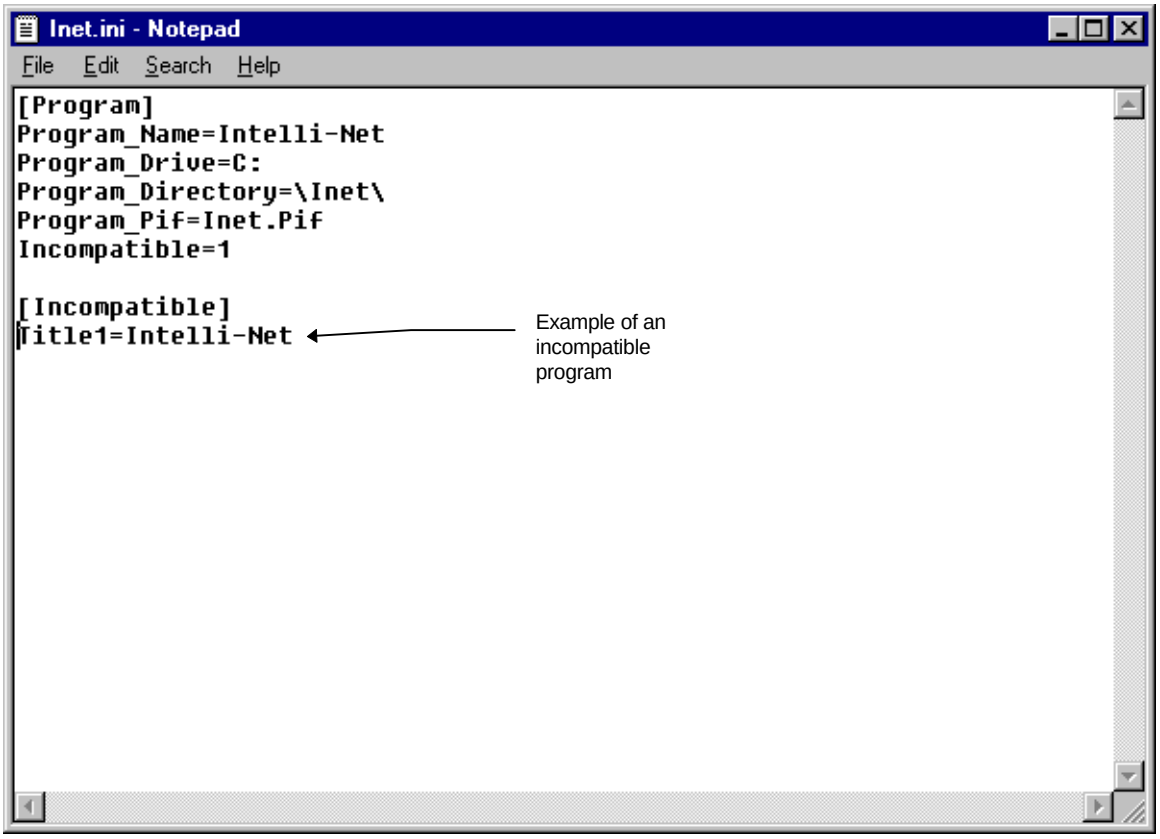
If installing **Intelli-Net** on a network drive, all users that will be accessing **Intelli-Net** will need **READ, OPEN, SEARCH, WRITE, DELETE,** and **MODIFY** trustee rights and directory rights to the **Intelli-Net** subdirectory.

Windows with Safe2Run

When installing in a Windows environment, a program called “Safe to Run” can be installed. Select “File” on the Windows tool bar. Select “Run” from the file menu, and choose the drive, the directory, then the Safe2Run.exe file. When prompted, enter the destination drive and directory for Safe2Run. When installation is complete, the following icons will be displayed on the Windows desk top.



Safe2Run will not allow any other incompatible programs to run with Intelli-Net, or allow Intelli-Net to be started twice. If additional programs are discovered, which are incompatible with Intelli-Net, double click with the left mouse button on the Intelli-Net incompatible icon. The Intelli-Net Notepad will be displayed, with the Inet.ini file. Change the "Incompatible = x" prompt to the appropriate number of programs. Also in the [Incompatible] section, add lines for each incompatible program as "TitleX = Filename".



Utilities

CHG_PLU.EXE

CHG_PLU.EXE is a utility program useful for modifying Intelli-Net ITEM files. This program allows you to make global changes to many of the item fields for a range of PLUs.

CHG_ET.EXE

CHG_ET.EXE is a utility program useful for modifying Intelli-Net Extra Text files. This program allows you to globally remove excess spaces and hard returns from your extra text records.

PCX.EXE

PCX.EXE is a utility program that takes graphics from the Intelli-Net database and creates individual PCX files. Files names are derived from the first 8 characters of the graphic description . If a file of that name already exists, the user is given a prompt to enter a new file name.

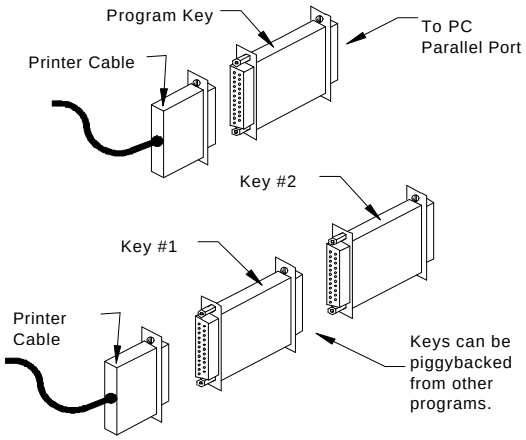
Installing The Program Access Key

Always turn the PC power off before connecting or disconnecting cables to the PC ports.

If running Intelli-Net on a Windows NT file server there is a driver for the RainBow Sentinel ™ key that needs to be installed to enable Intelli-Net to work.

This driver is on the Mettler Toledo BBS (614-841-5169) in the software library, and the file name is “rainport.zip”

Intelli-Net requires the use of a registered program access key installed on the PC's printer parallel port before access to all functions are permitted. The Program Access Key is shipped with each software package. The "key" must be installed on the PC's printer parallel port between the printer data cable and the port. The program key will plug into a female DB25 connector on the rear of the PC. If no printer is attached, just connect the key to the port. If other programs use different brand keys, they can be piggybacked (plugged into each other) as shown below in Figure 2.1. *Do not piggyback two Rainbow Sentinel™ keys. Use separate ports in this case.*



Starting Intelli-Net

Always work in the directory and drive that Intelli-Net is installed.

To start the **Intelli-Net** program, first make the drive it is installed on the default drive. The following example is using drive “ C”.

Starting the Intelli-Net Program

TYPE: MAIN

PRESS: [ENTER]

The **Intelli-Net** banner screen should now be displayed. If a DOS error message is displayed instead of the banner screen, the correct subdirectory may not have been selected, or the commands may been incorrectly typed. Try typing in the commands again. When the banner screen is displayed, press ENTER to continue, or any other key to exit. The banner screen can be by-passed by typing **MAIN MENU** instead of just **MAIN**. If no password is configured, the program will start at the main menu.

UNINSTALLING Intelli-Net

To uninstall Intelli-Net from your hard disk drive, simply use the DOS **DEL** command to delete the files.

Upgrading From Earlier Intelli-Net Versions

Copy all *.dat and *.ixo files from the old Intelli-Net directory into the new Intelli-Net directory created during setup. In the new Intelli-Net directory run the following conversion program(s) which corresponds to the old Intelli-Net version.

The following files can be retrieved from the Mettler Toledo Technical Support BBS 614-841-5169:

Conversion from 3.0 to 5.0.

- Run CV3TO4_2.exe
- Run CV42TO5.0.exe

Conversion from 4.1 to 5.0.

- Run CV41to50.exe

Conversion from 4.2 to 5.0.

- Run CV42to50.exe

Conversion from 4.3 to 5.0.

- Run CV43to50.exe

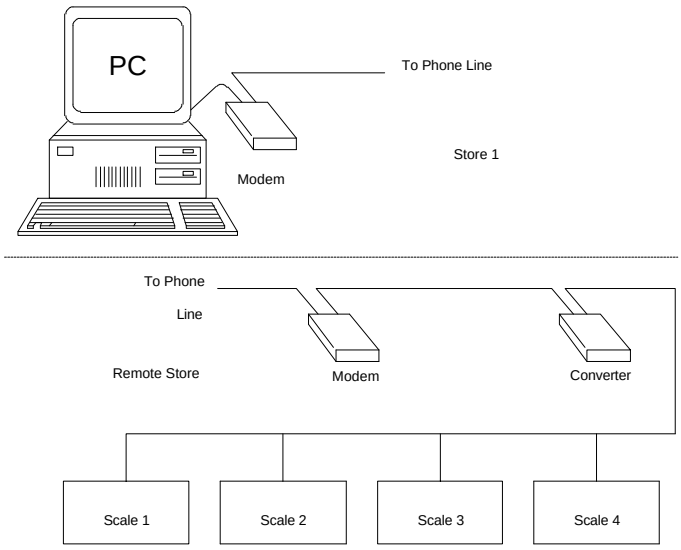
For example, to convert from 4.2 to 5.0, copy all the *.dat and *.ixo files from the Inet 4.2 directory. Then run the CV42to50.exe in the Inet 5.0 directory.

3 Learning Intelli-Net

Overview Of Major Functions

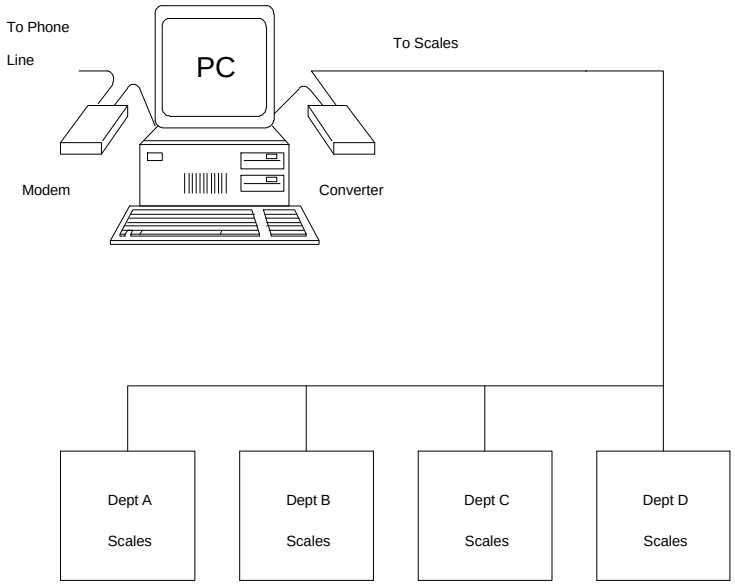
The METTLER TOLEDO **Intelli-Net** software is designed to operate on IBM 386, 486 and Pentium processors, or 100% compatible personal computers (PC) utilizing the DOS operating system, and on compatible PC network applications. An **Intelli-Net** system configuration would include the PC hardware, **Intelli-Net** software and key, one or more METTLER TOLEDO programmable scales, and the data cabling connecting the components.

The PC may be located in the same store as the scales, or in a remote location. When the PC is remote, communication is accomplished at the remote stores using a modem, as shown in the following diagram:



Two major functions are performed by **Intelli-Net.** One is central file maintenance. The second is collecting product data from the scales, compiling the data, and producing various types of reports.

An important feature of **Intelli-Net** is its department configuration. When the system is configured, the scales can be grouped into departments, as shown in the following diagram. A department is defined as a group of scales that use identical PLU (price look up) files. Changes can be made to a single department without affecting the PLU files in other departments. Intelli-Net can be configured for department passwords to only allow access to individual departments. Price or other types of changes are made by creating temporary files called Pending Files. The pending file can be created and modified over several sessions. When the pending file is complete, it can then be used to automatically update the PC Master File and all scales in a department. One set of prices, for example, can be used to update all scales in a department, rather than requiring a separate set for each scale.



Intelli-Net also provides features to support zone price, tare, and grade for multiple store applications. A maximum of 99 Price zones, 10 Tare zones, and 10 Grade zones can be configured in Intelli-Net.

Scale Types

Eight "types" of METTLER TOLEDO programmable scales are supported by **Intelli-Net**. Types 2-5 are reserved for 4-digit PLU scale types, and types 6-9 are reserved for scale types with 6-digit PLU capability.

Type 2 - 8301C

The Type 2, 8301C is a back room prepackaging scale typically used in produce and meat departments. The 8301C uses only a 4-digit PLU number. The 8301C has four sets of totals accumulators that collect data for totals dollars, total net weight, total package count, and total number of runs. The four sets of accumulators are automatic (A), manual pricing (M), rewraps (R), and combination rewrap and manual pricing (C). The maximum number of PLU records available in the model 8301C is 1004 (with optional memory expansion). The scale can be programmed for random weight and by-count pricing and will accept up to two lines of PLU description with 32 characters per line. The 8301C does not have host priority, but will automatically reset to the idle state if no activity has been detected for more than five minutes.

Type 3 - 8425

The Type 3, 4-digit PLU standard 8425 is a programmable service counter scale. The METTLER TOLEDO model 8425 has a single set of accumulators that will collect total dollars, and total net weight. Totals are reported in Intelli-Net in the Service (S) category. In addition the 8425 will collect hourly totals. The standard model 8425 will store approximately 507 PLU records. Random weight, by-count, and fractional (per quarter or half) pricing modes are available. The 8425 can be expanded up to a capacity of 1521 PLU records. The 8425 will accept up to two lines of description, with 32 characters per line. The 8425 operates in a host priority mode. When a host attempts communication with the 8425, any transaction in progress will be momentarily frozen until the host has completed communication with the scale.

Type 4 - 8422

The Type 4, 4-digit 8422 is a scale/controller which includes the models 8305M, 8422M, 8423M, 8423SA, and 8427SA. (M=Master Controller, SA=Stand Alone).

TYPE-4 MASTERS

A type-4 master may have up to 25 "satellite" scales connected in a network to the master controller. Each master can be configured for up to 10 departments (0-9). This department configuration is similar to the

department configuration Intelli-Net uses. Only the master scale is connected to the **Intelli-Net** network. The satellites communicate directly to the master controller and all PLU records and totals are centrally located in the master. The older master scales (8422M/8423M factory numbers 1001 and below) have a storage capacity of approximately 1700 PLU records.

Later versions of the master scales (8422M/8423M factory numbers 2001 and up, and all 8305M) have a storage capacity of up to 4000 PLU records (depending on length of PLU description and extra text) and are capable of accepting Extra Text Records (with proper software installed). The memory in these scales (8422M/23M/8305M -2001 and up) can be upgraded to 1.5 Meg with an optional kit which will hold approximately 12000 PLU records (depending on length of description and extra text. With extra text software installed, the master scales can be programmed for standard pack, random weight, fractional, by-count, and pounds-for pricing modes. The totals for each satellite are automatically collected and stored by the master controller. The later versions of the master scales can accumulate four types of totals, total dollars, total net weight, total package count, and total number of runs for each PLU record. The totals in the later version masters are reported in automatic (A), manual (M), rewrap (R), and combination manual and rewrap (C) categories. In addition, hourly totals are available. Type-4 masters are multitasking. The host can communicate with the master without interfering with the satellite scale communication to the master.

TYPE-4 STAND ALONE

The "SA" refers to "stand alone" versions, such as the 8423SA and 8427SA scales. These type of scales have a similar host interface as the master controllers, however, no satellites can be connected to the stand alone scales. The model 8423SA scale memory capacity is approximately 1400 PLU records. The model 8423SA must be in the idle mode before attempting communication with a host. The model 8427SA comes standard with 128 K of memory which will hold approximately 1000 PLU records and can be expanded up to 512 K with a capacity of 4000 PLU records. The 8427SA can also accept Extra Text records. The capacity will vary depending on the number and length of extra text records stored in the scale. The model 8427SA must be in the idle mode before attempting communication with a host.

TYPE 5 - 350 4-DIGIT (requires C or later software)

The Type 5, 4-digit PLU standard 350 is a programmable thermal label ingredient printer typically used in bakery departments. A maximum of 490 PLU records can be programmed depending on length of the descriptions and extra text. A single set of accumulators can track totals by PLU number, item number, group, by hour, and grand totals. Totals are accumulated in Intelli-Net in the Service (S) category. Pricing modes available include random weight, by-count, fractional (per quarter and half), and standard pack.

TYPE 6 - 8422 6-DIGIT

New 8422M, 8423M, 8305M, and 8427SA scales have the capability of switching to either a 4 or 6 digit PLU number. If you have selected 6-digit PLU in the scale setup, use type-6 to identify the scale in Intelli-Net configuration. The newer type 4 masters can also accept an expanded memory board to increase storage capacity in the master to 1.5 MB. Other characteristics are the same as the type-4 scales.

TYPE 7 350 6-DIGIT (requires C or later software)

By adding optional software, the 350 can use a 6-digit PLU number. Other specifications are the same as type 5 350.

TYPE 8 8425 6-DIGIT

By adding optional software, the 8425 can use a 6-digit PLU number. Other specifications are the same as type 3 8425.

TYPE 9 8460

The type 9, 6-digit 8460 is a scale/controller which includes the model 355SA, 8360, 8450SA, 8460M, and 8461M (M=Master controller or SA= Stand Alone).

TYPE-9 MASTERS

A type-9 master (8360 and 8460) may have up to 25 satellite scales connected in a network to the master controller. Each master can be configured for up to 15 departments (0-14). This department configuration is similar to the department configuration Intelli-Net uses. Only the master scale is connected to the **Intelli-Net** network. The satellites communicate directly to the master controller and all PLU records and totals are centrally located in the master.

The totals for each satellite are automatically collected and stored by the master controller. The later versions of the master scales can accumulate four types of totals, total dollars, total net weight, total package count, and total number of runs for each PLU record. The totals in the later version masters are reported in automatic (A), manual (M), rewrap (R), and combination manual and rewrap (C) categories. In addition, hourly totals are available. Type-9 masters are multitasking. The host can communicate with the master without interfering with the satellite scale communication to the master. In addition, the Type 9 scales can support nutrition facts and graphics.

The 8460M comes standard with 512 KB, and can be expanded up to 4 MB with option memory cards. When extra text is used, the total memory available for PLU records depends on the length of the extra text records.

The 8460/8360 MASTER collects accumulator/plu totals which can be collected by Intelli-Net.

There are 5 different modes that plu totals are saved in. You can select which ones you want intelli-Net to collect.:

A- automatic mode

M- manual mode

R- rewrap mode

C- combination of above 3

I- Inventory

Type 9 Satnd Alone (SA)
The "Type 9 SA" refers to the 8450SA and 355SA scales. These type of scales have a similar host interface as the master controllers, however, no satellites can be connected to the stand alone scales. The type 9 SA can also accept Extra Text, PLU's, NF, and graphics records. The capacity will vary depending on the number and length of extra text records stored in the scale. When using Intelli-Net with a type 9SA, the department the scale is set up for must be the same department you are working with in Intelli-Net.

RS232 Single Scale Interface

The 8427SA requires a converter to connect to a PC serial port).

If a ***single*** type-4 **master** scale (8305M/8422M/8423M) or the model 8423SA (stand alone version) or type 9 masters (8360,8460,8461) or type9 Stand Alone (SA) (8450, 355) are used, it can be connected directly to the PC's RS232 serial port without the use of a converter. These scales use the standard RS232 interface for host communications. Maximum cable length between the scale and PC is limited to 100 feet. If a distance greater than 100 feet is required, the METTLER TOLEDO RS232/RS422 Converter is recommended. An alternative method when cable lengths over 100 feet are used is an RS232 Serial Driver or line booster. See appendix for additional information.

RS422 Multiple Scale Interface

When more than one scale is used, conversion from the PC's RS232 to an RS422 multidrop configuration is required. In this case, the METTLER TOLEDO RS232/RS422 Converter (switch box w/ wall transformer P/N 13554100A or DB25 female 232 to DB25 male 422 P/N 14029400A wall transformer for BD 25 is P/N 14029400A) will be required at the PC and at each 8422M, 8423M, 8423SA, 8305M, and 8460M scales on the network. When connecting the models 350, 8301C, 8425, and 8427SA scales to an RS422 network, converters are not required at the scales since they are

already set up to use RS422 communications. Refer to the application examples in chapter 9 which show different wiring examples using the various scale types.

In an RS422 multidrop configuration, all of the scale host ports are wired to the common four-wire data cable that connects to the converter at the PC. The scales are identified by the host through the use of scale address numbers. The PC is always in direct control of communications by using the scale address to directly talk to a particular scale. In applications where a modem is connected at a remote store, the converter will be connected to the modem.

Intelli-Net Configuration

When **Intelli-Net** is first installed, enter the configuration data. The configuration data includes store and department configuration, passwords, baud rates, com ports, printer control codes, report configurations, etc. This data is stored in two files called CONFIG.DAT and CONFIG.IX0. Intelli-Net can be configured with a master password, and with department passwords. The master password allows access into all areas of **Intelli-Net,** while the department password limits access to areas of a specific department only. The major configuration groups are as follows:

Reports

Reports can print out totals data sorted by the method selected in the report configuration. The totals can be sorted by total dollars, net weight, package count, number of runs, PLU number (ascending/descending), Item number, and Class/ Group.

Department Configuration

Up to 15 departments can be created in Intelli-Net. Each department must be assigned a code letter (A-O), name, and department password (optional). The department is created first then added to the store configuration. Different stores may have different department configurations. The department password allows department supervisors to perform maintenance on only the departments they have authorization for.

Store Configuration

Store configuration includes: store number (1-9999), data phone number (remote stores 2-9999 only), price zone (1-99), tare zone (1-10), alternate tare zone (1-10) com port (1-4) and IRQ, baud rate, grade zone (1-10) and the scale type/address for all scales by department for each store. (Price,Tare and Grade Zones are based on the individual departments with each store.) ***The local store is always Store #1.*** A local store is defined as a store configuration which would have the PC connected directly to a local in-store scale network. Remote stores use store numbers 2 through 9999 (a maximum of 150 stores can be configured by Intelli-Net) . Remote stores use a modem to communicate with the PC. Different com ports can be assigned to specific stores. For example, if you configure both a local store and remote stores, the local store can be assigned to use COM1 at 9600 baud, and the remote stores could be connected to a 2400 baud modem using COM2. This would eliminate the need for a data switch. Each store can be configured with combination scale types, up to 24 scales per store network. When configuring an 8422M/8423M/8305M/ 8460M/ 8360M/8461M / 8450SA scale, do not include satellite scales attached to a master. Only the master communicates with the host PC. A single master scale can also be configured for multiple departments. When configuring a master scale in multiple departments (0-14), you would use the same scale address number for each department. In this case, a master that is configured in 10 different departments would be counted as 10 scales (although it is really only one physical scale) when you check availability of scales.

Company Configuration

Other items having a selectable configuration include:

See Chapter 4 for additional information on levels of passwords

Intelli-Net passwords: master and supervisor must be programmed to use departmental passwords. This will allow specific access to departments.

- **SUPERVISOR PASSWORD** - When used, allows access to all functions except the company configuration, store configuration, and department configuration functions, except delete all PLUs or ET records functions.
- **MASTER PASSWORD**. When used, allows access to all **Intelli-Net** functions.
- **STORE/COMPANY NAME** - Up to 32 characters can be entered that will print as a heading for reports.
- **NORMAL PITCH** - A hex code used to switch an 80 column printer to normal draft print mode. Some of the reports use more than 80 columns, requiring software codes to be sent to the printer to switch it between compressed and normal print modes. Press the **F1** key to list some

common printer codes. If your printer is not listed, refer to the manual supplied with your printer for a control hex code listing.

- **COMPRESSED PITCH** - A hex code used to switch an 80 column printer to compressed print mode. Some of the reports use more than 80 columns, requiring software codes to be sent to the printer to switch it between compressed and normal print modes.
- **TEXT FOREGROUND/BACKGROUND** - Select text color for foreground and background when **Intelli-Net** is used with a color monitor.
- **BORDER FOREGROUND/BACKGROUND** - Select outside border text foreground and background colors when **Intelli-Net** is used with a color monitor.
- **WEIGHT MODE (LB/KG)** - Used to select LB (pounds) mode or KG (kilogram) mode. If the scale is calibrated and set up for LB, the assumed decimal point is hundredths (0.00). If set in KG mode, the assumed decimal point is thousandths (0.000).
- **PRINTER AVAILABLE (Y/N)** - This selection sets the default for the printer status. **N** = printer **OFF** whenever **Intelli-Net** is started. **Y** = printer **ON** and available. If set to **NO** all normal output will be written to a file called **LOG.DAT** in the **Intelli-Net** subdirectory. This file should be viewed and cleared periodically or it will become quite large. Use the Miscellaneous Functions Menu selection **CREATE NEW LOG FILE** to clear the file.
- **REDIAL DELAY** - Enter time (in seconds) to delay before dialing remote stores in an autodial session. This function is useful when phone line disconnect problems may exist.
- **MODEM INITIALIZATION STRING** - Use this entry to send the modem a customized initialization string. Leave blank if no changes are needed.
- **DECIMAL POINT LOCATION** - This entry specifies how many digits will appear after the decimal point in the price.
- **USING 8460's** - This selection will determine whether certain prompts, that pertain only to the 8460 scale, will be displayed when editing a PLU. Select **Y** if you are using 8460s. Select **N** if you are not. If you add an 8460 to your configuration, make sure you change to **Y** in the Configuration Section.
- **ADVANCED FEATURES** - This selection will determine whether certain prompts, that pertain only to the 8360 scale, will be displayed when editing a PLU. Select **Y** if you are using 8360s. Select **N** if you are not. If you add an 8360 to your configuration, make sure you change to **Y** in the Configuration Section.

Program Files

When you first start up **Intelli-Net,** certain data files will be created on your hard disk drive in the Intelli-Net subdirectory. The data files can be identified by name. Each type of data file will include a file name prefix with the extension "**.DAT"** and one or more "index" files with the extension (**.IX0)**. The following section describes the different types of files used by **Intelli-Net**.

Master PLU File

The master file contains the PLU records for all departments and stores configured in **Intelli-Net**. The PLU record includes:

- Department Number
- PLU (Price Look Up) number
- Item number (item identifier encoded in the UPC code)
- Class/Group
- Grade
- Vendor number
- Bar Code Type
- Random Weight Type
- Blanked Outputs
- Description
- Zone prices
- Zone tares
- Zone alternate tares
- Package code (pricing modes 0-3)
- Modifier (used for by-count/pounds for pricing mode)
- Action code (master scales only)
- Shelf life
- Eat-by date
- Maintenance date
- Extra text number (the ET number links extra text records to the PLU number)
- Nutrition Facts Number (the NF number links the nutrition facts records to the PLU number)
- Turn Label

- Date Forwarding
- Line Size
- Label Style
- Sat Graphics
- DayGlo Number
- Graphics number (the graphics number links the graphic record to the PLU number)
- Effective Time
- Effective Date

The DOS files that contain this data are called: **ITEM.DAT** and **ITEM.IX0**. The complete master file can be transferred to a floppy disk by copying both of these files.

Master Pending File

Pending files are used to temporarily record changes to the data records before they are permanently posted to the scales and the master file. All pending files created in **Intelli-Net** are stored under the DOS file names: **PENDING.DAT** and **PENDING.IX0**. One or more pending files can be created for each department configured in the system. A pending file can contain new records, lists of records to delete, price changes, or changes to other data fields in existing records. Pending files are used to update the extra text records, the action message records, the nutrition facts records, and the graphics records in the master PLU file and in the scales. A pending file can be created over multiple editing sessions. The pending file only becomes part of the permanent record when it is selected for updating. Six types of pending files can be created:

- **S** is a (S)ale pending file
- **R** is a (R)egular pending file
- **E** is an (E)xtra text pending file
- **A** is an (A)ction message pending file
- **N** is a (N)utrition facts pending file
- **G** is a (G)raphics pending file.

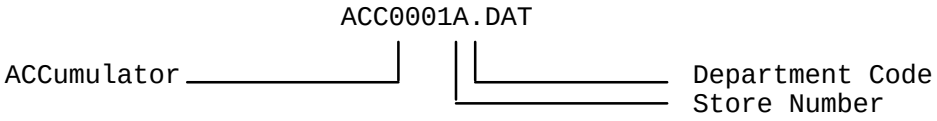
Whenever a sale (S) pending file is selected, **Intelli-Net** will automatically create an off-sale pending file with the same name as the original sale pending file. Sale pending files are used to update the master file and scales with the new sale price. The sale-off file can then be used later to revert back to the pre-sale price.

Accumulator Totals Files

"ACC" is the default name. It may be changed to the operator's selection.

Accumulator totals files store the production totals collected by-store and by-department. When the data collection sequence is initiated, each scale's

accumulators are collected and summed in the store/department production file. The file names can be decoded as follows:



The accumulator files will only be created when totals are collected.

Extra Text File

The extra text file contains all of the extra text data programmed in **Intelli-Net**. The file contains the extra text code, text body, and label formats. The extra text file is stored under the DOS files named: **EXTRATXT.DAT** and **EXTRATXT.IX0**.

Action Message File

The action message file contains the action messages used in the model 8422M/8423M/8305M/8460M scales and the 8423SA/8427SA scales. Action messages are single lines with up to 63 characters per line. The action messages will have the DOS file names: **ACTION.DAT** and **ACTION.IX0**.

Nutrition File

The nutrition file contains all of the nutrition fact data programmed in **Intelli-Net**. The file contains the nutrition fact codes and data. These nutrition fact records will be supported only by the type 9 and the 8422M scales which have the Nutrition facts upgrade. Nutrition files are stored under the DOS file names **NUTRI.DAT** and **NUTRI.IX0**.

Graphics File

The graphics file contains the graphic data imported into **Intelli-Net**. Graphics are small images that can be printed on the label. It is limited to a monochrome bitmap of 25920 pixels. These are only supported by the 8460M scales. The graphics files are stored under the DOS names **GRAPHICS.DAT** and **GRAPHICS.IX0**. Graphics are also used on DayGlo labels in the 8360M scale.

Future Files

Future files allow you to create a pending file which will not be activated until a later time. Future files require that only model 8460M scales are found in the departments for all stores to which this pending file is sent.

Future files are stored under the DOS file names **FUTURE.DAT** and **FUTURE.IX0**.

Grade Table File

The master grade table contains grade information and is located in the file **GRADE.DAT**

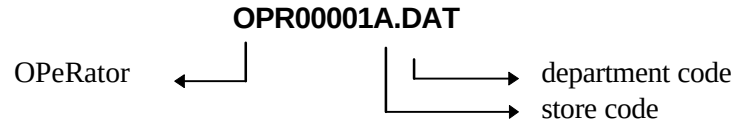
Autodial Script Files

Autodial script files are stored with an extension of **.ADL**. These are ASCII file created when recording an autodial session. The files can be edited using a standard ASCII file editor.

Operator Totals Files

"OPR" is the default name. It may be changed to the operator's selection.

Operator totals files store the operator totals collected by-store and by-department. When the data collection sequence is initiated, each scale's operator accumulators are collected and stored in the store/department operator file. The names can be decoded as follows:



The operator files will only be created when operator information is collected.

Obsolete Accumulator Totals Files

These files are the same as Accumulator files, but are for PLUs that have been obsolete.

What are obsolete accumulators?

Obsolete accumulators are accumulators that are saved when weekly data for PLUs are updated.

Communicating with the Scales

One of the major functions of **Intelli-Net** is communicating with the scales. The PC, under **Intelli-Net** control, initiates all communications. The

communications are well interlocked to provide a high integrity of data between the PC and scales. If a malfunction occurs, a variety of error codes allow **Intelli-Net** to report the problem and prevent erroneous data errors from continuing.

Certain scales are not multitasking devices. In other words, they cannot perform transactions and communicate to a host at the same time. Steps should be taken to verify that the host will be able to communicate with the scales when necessary. The model 8301C, 8423SA, and 8427SA will report a "busy" message if they are involved in a transaction when the host attempts to communicate with them. When these type of scales are used, the store personnel should be informed to clear the scales after every transaction so they will be able to communicate with the host. Other scale types, including the 8422M/8423M/8305M/8460M scales, the 8425, and the 350, have a host priority mode. Host priority means when a host attempts communicate, they will temporarily interrupt transactions while the host is communicating with them. The model 8301C does not have a host priority mode, however if the scale is idle for more than five minutes, it will automatically reset to the idle mode.

CHECKING SCALE STATUS

Intelli-Net includes a main menu function called **Check Availability of Scales** that can be used to verify the status (On-line/Off-line) of all scales in a store. If one or more scales show an Off-Line status, you may want to wait before any posting to the scales is performed to make sure all requested scales receive the updated data. If a particular scale is showing Off-line continuously, you may want to investigate the cause before attempting to update the department's scales.

VERIFYING SCALE DATA

The **Intelli-Net** Miscellaneous Functions Menu selection called **Verify Scale Data for One Scale** will compare the PLU file in a scale with **Intelli-Net**'s master file. This function will first upload the entire PLU file in the selected scale and compare it with the existing **Intelli-Net** master file. A report will be printed that will show any discrepancies between the two files. If it is suspected that a scale program has been changed locally at the scale, the verify report will show differences between the **Intelli-Net** master file and the scale file. If differences occur, the master file can be sent to the scale that will overwrite the existing file with the **Intelli-Net** master file.

ADDING NEW SCALES

If a new scale is added to **Intelli-Net**, a department function called "Copy PLU File to Scale(s)" can be used to send a single department PLU file to the scale. The Main Menu function **TRANSFER MASTER FILES TO SCALE** can be used to download all departments PLU files, Extra Text, Nutrifacts, etc. to a new scale. If the new scale already contains an existing PLU file, the PLU file can be uploaded into a new **Intelli-Net** department. New PLU files can also be created using a pending file to create new PLU's. Once the pending file is complete, it can be used to update the master file and the new scale.

Master Database

Intelli-Net requires that all editing is accomplished using PLU numbers. The PLU number is the reference number that you will use to create or edit the data records. Some reports allow sorting by either Item number or PLU number. However, the Item number cannot be used to call up individual records in **Intelli-Net**. The PLU number is limited to six digits maximum.

The master PLU file is the permanent file containing all of the PLU records. Changes to the master file can only be made two ways:

To update from one version of Intelli-Net to another, install the new version, and upload all of the data into the new version.

- Uploading an existing PLU file from a scale will add new PLU records or new price or tare zones to existing PLU records.
- Updating the master file and scales with a pending file will add new records, delete existing records, or modify existing records.

UPLOADING AN EXISTING FILE FROM SCALE

When first setting up an **Intelli-Net** network using existing scales, the PLU file in the scales can be uploaded into **Intelli-Net** to create a master file. The scales can be local or remote (using a modem). When uploading from a scale, you can select either Overwrite Existing File, or Append to Existing File. Appending will not overwrite existing data in the master file. If records exist already, the uploaded duplicate PLU number will be discarded unless the zone price or zone tare is different than the existing record in the master file. In this case, the new zone price or tare will be added to the existing master file record. New departments can also be added using the upload method.

CREATING A NEW MASTER FILE USING PENDING FILES

A new master file can be created using a pending file. The pending file is a temporary file that contains changes that are pending to the master file. If a master file does not exist, the pending file will contain only additions to the master file. Pending files are created by first selecting a department, then selecting "Pending File Maintenance" from the department functions menu. Next, select "Create New Pending File". function key (F10). For the pending file type, select R for a regular pending file and give it a name. Next, by selecting the new pending file, you can create new records that will be later used to update the master file and the scales you will be adding to the department.

Pending Files

There are six types of pending files: (S)ale, (R)egular, (E)xtra Text, (A)ction Message, (N)utrition, and (G)raphics.

SALE PENDING FILES

A sale pending file is used to temporarily change the prices of selected PLU records. Whenever a sale pending file is created, **Intelli-Net** automatically creates a "**sale-off**" pending file that contains the original pre-sale prices of the PLU's. When the sale ends, you would then update the master file and scales with the sale-off pending file to change the PLU prices back to their regular pre-sale prices.

REGULAR PENDING FILES

Regular pending files must be used to add all new PLU records, delete existing PLU records, or modify the data fields in existing PLU records in the scales and/or the master file.

EXTRA TEXT PENDING FILES

Extra text records are added, modified, and deleted using extra text pending files. When creating an extra text pending file, you are asked to provide only the extra text code for the records you wish to update in a scale and/or the master file. An additional function, Setup All Extra Text Records, will load all of the existing extra text codes into a pending file automatically. When this pending file is selected, all existing records will be sent to a scale and/or to the master file.

ACTION MESSAGE PENDING FILES

Action pending files are used to add, modify, or delete action messages used by the type 4 or type 9 scales. Action messages can be used to replace the store message line on a label, or if type 3, to perform a scrolling marquee message on the scale display. When creating an action message pending file, you are asked to provide only the action message code for the records you wish to update in a scale and/or the master file. An additional function, Setup All Action Message Records, will load all of the existing action message codes into a pending file automatically. When this pending file is selected, all existing records will be sent to a scale and/or to the master file.

NUTRITION PENDING FILES

Nutrition pending files are used to create, modify, or delete nutrition records used by the type 4 and type 9 scales which have been upgraded for this feature. When creating a nutrition pending file, you are asked to provide only the nutrition number for the records you wish to update in a scale and/or the master file. An additional function, Setup Nutrition Fact Records, will load all of the existing nutrition facts records into a pending file automatically. When this pending file is selected, all existing records will be sent to a scale and/or to the master file.

GRAPHICS PENDING FILES

Graphics records for type 9 scales are created, modified, and deleted by using graphics pending files. Again, when a graphics pending file is created, each graphics code desired for update is entered individually. If necessary, the Setup Graphic Records command can be used to create a pending file with all the graphic records in it. When this pending file is sent, all the graphics files are sent to the scale and/or master file.

4

Using Intelli-Net

Using Intelli-Net is a reference section to assist in operation of the program. It contains detailed operating instructions including sample menu displays and step by step keyboard input sequences.

Introduction

Intelli-Net uses a menu method of presenting various options to the operator. The menu functions can be selected by pressing the highlighted letter on the item desired, or by using the cursor up/down keys to highlight the desired selection, then pressing the ENTER key. Each time a menu item is selected, a new smaller window will open up allowing the previous menu's title to be seen at the top of the screen. Some selections may require a full screen window, and will temporarily hide the previous window. **Intelli-Net** will also display various messages on the screen or printer to provide information as to what functions are being performed and the status of the functions.

A sample of the Main Menu is shown in the following Figure 4.1.1.

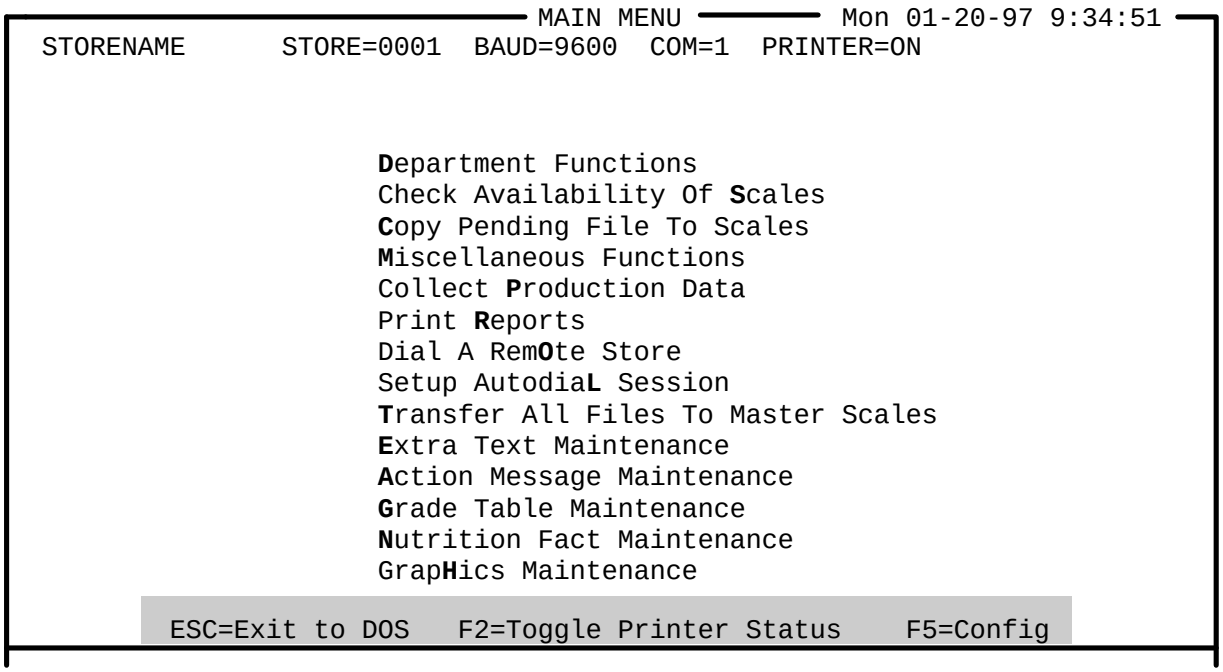


Figure 4.1.1

The **Intelli-Net** Main Menu provides access into the different sections of the program:

- sub-menus
- prompts for input

Use the <ALT><M> key sequence to return to the main menu from any of the sub-menus.

The previous level menu titles will almost always be visible at the top of the screen. Line two will show the current store, baud rate in use, price zone, and tare zone. These items are entered into the configuration data.

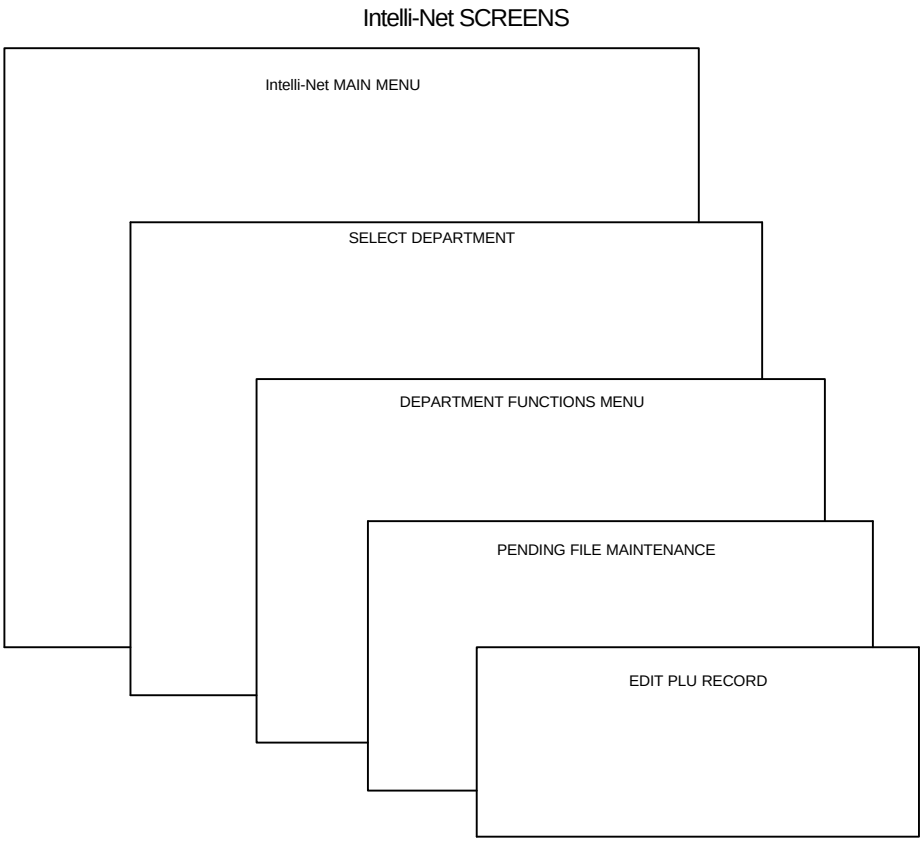
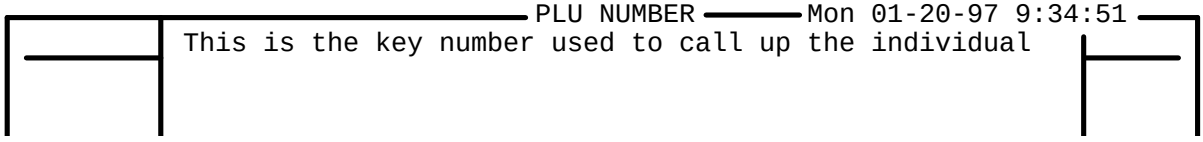


Figure 4.1.2

On-Line Help

ON-LINE HELP information is available for most prompts or menu selections by pressing the **<F1>** function key. The HELP is "context sensitive". This means the on-line help is referenced to where the blinking cursor is located on the monitor or to the menu selection that is currently highlighted. If help is available on the subject, a small window will display at the top of the screen. Shown in Figure 4.1.3 is an example of the on-line help window. The cursor position was on the **PLU Number** data field when **<F1>** was pressed. The help window describes what the PLU number is, and the valid range of PLU numbers. To view the rest of the on-line help text, use either the cursor up/down keys, or the PageUp/PageDown keys. To end the on-line help, press the **ESC** key.

Intelli-Net ON-LINE HELP WINDOW



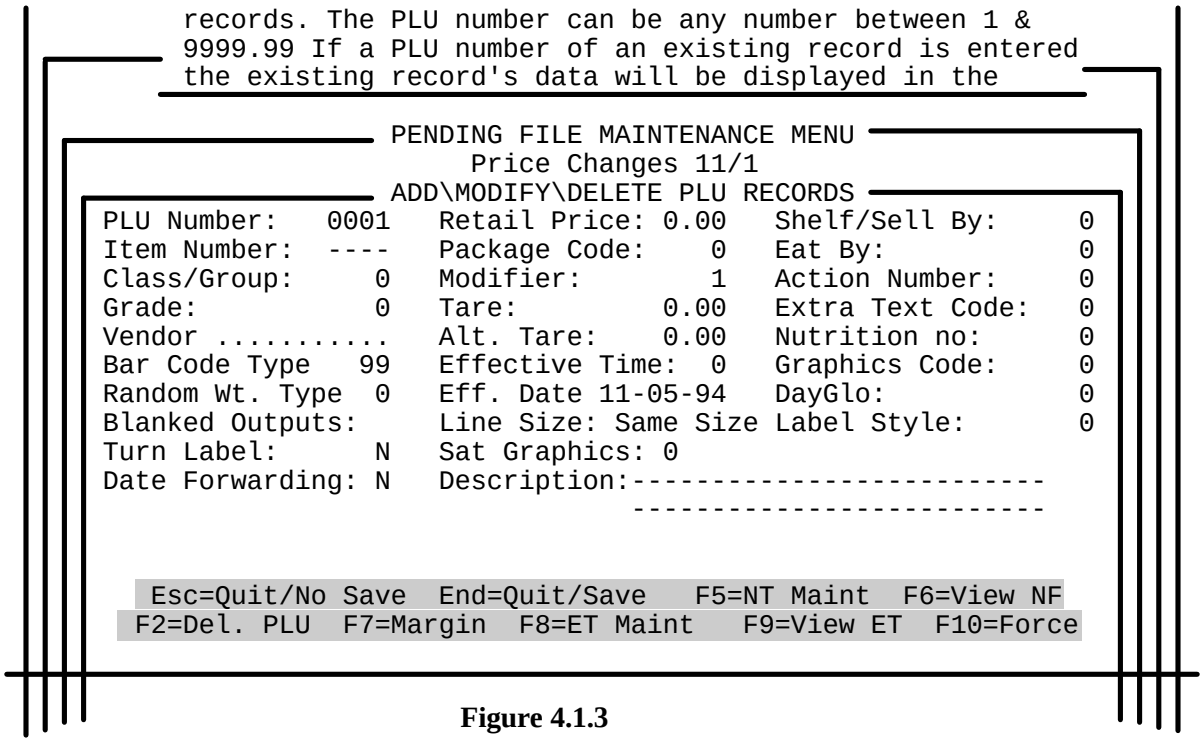


Figure 4.1.3

Starting an Intelli-Net Session

Before starting **Intelli-Net**, **it is important that the PC's time and date are current**. **Intelli-Net** uses the time and date whenever data is entered or changed. To start the program, first change directory (CD) to the **Intelli-Net** subdirectory. For the following example, **INET** will be used for the **Intelli-Net** subdirectory installed on drive **C.**

Replace the actual name of your Intelli-Net subdirectory in place of INET, and the actual drive (C-Z) when starting your Intelli-Net program.

TYPE:	C:	*(Optional if you are on the correct drive already.)*
PRESS:	[ENTER]	
TYPE:	CD *INET*	*(Use the actual name of the Intelli-Net directory.)*
PRESS:	[ENTER]	
TYPE:	MAIN	
PRESS:	[ENTER]	

CAUTION: Do not install or remove the printer cable or the authorization key while the PC power is on. Always turn the power to the PC off before installing or removing accessories.

If running **Intelli-Net** on a network drive, the system must have Read, Create, Delete, Write, Modify, and Search rights to the **Intelli-Net** subdirectory in order to run the program. The **Intelli-Net** subdirectory must be the default before starting the program. The Authorization Key, supplied

with the program, must be installed on the PC's printer parallel port before starting the program.

When first starting the **Intelli-Net** program, the first screen will be the banner screen. Press the **ENTER** key to continue, or any other key to abort loading the program. When **Intelli-Net** is initially installed, there is no password, so you will next see the **Intelli-Net** Main Menu. When passwords have been configured in **Intelli-Net**, the password screen will be displayed, prompting for a valid password. You must then type in a valid password and press the **ENTER** key in order to advance to the Main Menu. To by-pass the banner screen type in **MAIN MENU** at the DOS prompt.

Passwords

If passwords are not configured, the password screen will not be displayed.

When configuring passwords, write them down and store them in a secure place.

Passwords can be configured in **Intelli-Net** to limit access to certain areas of the program. There are three levels of passwords to provide the required amount of security to the configuration data, and master file. Always enter the password with **CapsLock ON** when entering alpha characters. The passwords are recorded in uppercase only whether the **CapsLock** is on or off. When starting Intelli-Net, the correct password must be typed in with uppercase letters (**CapsLock** ON) when using alpha characters. The three security levels of passwords used by **Intelli-Net** are as follows:

- **MASTER PASSWORD** - allows access to all **Intelli-Net** functions. If no password is configured, all operators using **Intelli-Net** will have full access to all functions. The master password is entered in the **Configuration** Menu, under **Modify Company Data**. The master password is required to set the supervisor password and department passwords.
- **SUPERVISOR PASSWORD** - allows access to all **Intelli-Net** departments. It does not allow access to the program configuration functions. It is entered in the **Configuration** Menu, under **Modify Company Data**.
- **DEPARTMENT PASSWORD** - allows access to a specific department to perform maintenance in that department only. The department passwords are set when creating or modifying a department in the **Intelli-Net Configuration Menu**, when logged on using the master password.

Configuration

The **CONFIGURATION MENU** is used to configure stores, departments, report formats, passwords, display colors, and printer codes. It is accessed by pressing the **<F5>** function key for **CONFIGURATION** while at the Main Menu. After pressing this **<F5>** key, you will see the **CONFIGURATION MENU** as shown in Figure 4.4.1

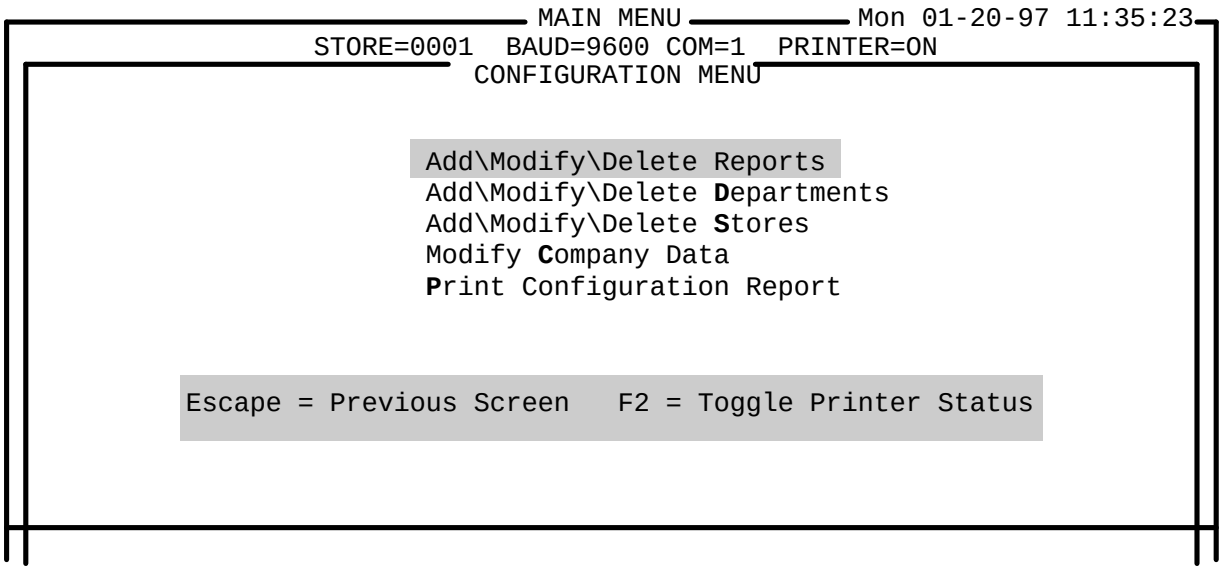


Figure 4.4.1

The following sections will describe the **CONFIGURATION MENU** functions.

Add\Modify\Delete Reports

Before any reports can be printed, they must be configured using the **ADD\MODIFY\DELETE REPORTS** function. To add a new report format, first select **Intelli-Net CONFIGURATION** from the main menu, then select **ADD\MODIFY\DELETE REPORTS** from the configuration menu. **Intelli-Net** will then display the **ADD\MODIFY\DELETE REPORT RECORDS** screen, as shown in Figure 4.4.2.

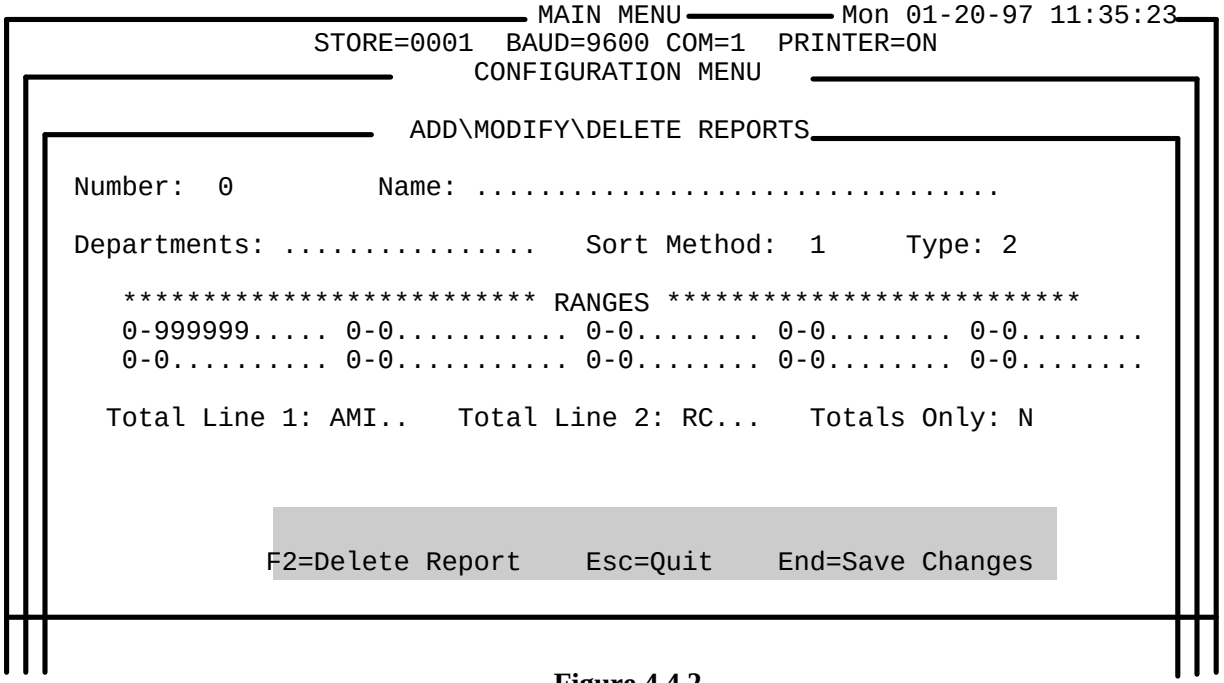


Figure 4.4.2

If a report number is entered for a report that already exists, the data fields will show the existing report configuration. The report can then be modified by typing in new data. To delete an existing report, enter the report number, then press the **F2** function key. Press **Y** to confirm the deletion, or **N** to abort. Use the cursor arrow keys to move between fields. Press and hold **CTRL** then use the cursor left or right arrow keys to move in the field. The **HOME** key will move the cursor to the **Number** field and the **END** key will jump to the **Totals Only** field. To clear a field, use the **Backspace** key or **ALT** and **D** (press and hold ALT then press D). **On-line** Help is available by pressing the **F1** function key.

The report field descriptions are as follows:

- **Number** - A number between 1 and 30 which is used for the report ID number.
- **Name** - The name can be up to 32 characters and will be used for the report heading.
- **Departments** - One or more department code letters must be entered for the departments you want to include in this report. Enter multiple departments by typing the letter codes with no spaces or commas in between the letters. (Example: ABCDE)
- **Sort Method** - The sort method determines how the columns will be sorted. Enter in the sort codes as follows:

  1 = Descending Total Dollars

  2 = Descending Total Net Weight

  3 = Descending Total Package Count

  4 = Descending Total Number Of Runs (8301C Only)

  5 = Ascending PLU Number

  6 = Ascending Item Number

  7 = Ascending Class/Group Number

  8 = Obsolete date and time (obsolete report only)

- **Type** - The type field will have a standard default value of **2**. This code determines which non-zero accumulator PLU records will be included in the report. The type codes are as follows:

  1 = Sale Items Only

  2 = Range Of PLU Numbers

  3 = Range Of Item Numbers

  4 = Range of Group/Class Numbers

- **Range** - The range field is used for Type Codes 2 through 4. There are ten sets of ranges available. For example, if you enter a type code 3, to get the non-zero accumulator item numbers, the range field allows you to select all or only the item numbers you want included in the report. The values are entered with a dash (-) in between the numbers. Just press enter if you do not want to change the values. The default range is 0-999999.

- **Total Line 1** - The accumulator type codes are entered in this field. The letter codes are as follows:

  A = Automatic (Scale Types 2,4, and 9 only).

  M = Manual (Scale Types 2,4, and 9 only).

  R = Rewrap (Scale Types 2,4, and 9 only).

  C = Combination (manual and rewrap, Type 2,4, and 9 only).

  I = Inventory (Scale Type 9 only).

  I = Service (Scale Type 3 only).

The accumulator codes determine which accumulators will be summed into the column totals for **Total Line 1** on the report. The codes also determine which accumulators will be summed, then divided by the column total to determine the percentage value printed on the report. In type 4 scales, the **A**, **M**, **R**, and **C** accumulator sets include individual accumulators for Total Dollars, Total Net Weight, Total Package Count, and Total Number Of Runs. However, type 3 service counter scales (8425) only have one set of accumulators for each PLU record which includes: Total Dollars, Total Net Weight, and Total Package Count. When you have a department that includes the type 2, 4 and 9 scales, as well as the type-3 scales, the type-3 scales accumulators are assigned to the accumulator code type **I** (inventory). This is necessary because the service counter scales accumulators do not correspond to the **AMRC** accumulators used by the type 2, 4 and type 9 scales. Type 4 8422 satellite scales will not report type **R** and **C** accumulator totals.

- **Total Line 2** - The second totals line can be used to select different accumulator type codes or can be left blank, if desired.
- **Totals Only** - The default value for this field is always **N**. Entering **N** selects all records for printing. Entering **Y** will select only the totals columns for printing.

After stepping through all of the data fields, you will be asked "**OK To Update Record (Y/N)**". Press **Y** to save the new report format, or **N** to redo or abort. Press **ESC** to return to the **Configuration** menu.

Add\Modify\Delete Departments

Up to fifteen departments (A-O) can be configured in **Intelli-Net**. At least one department must be configured. The department can cover the whole store, or individual departments (bakery, meat, deli, etc.) can be configured. The **Modify Departments** function allows you to supply the department name and optional department password. A department is added when you enter a name for the department code entered. Each department can use the same password, or each can use a different password. The department password (when used) restricts the **Intelli-Net** operator to specific department functions only. The rest of the configuration (scale address numbers, baud rates, etc.) are entered in the store configuration, when a department is added to a store. (Note: the department codes in master scales

use digits 0-9 and correspond accordingly to the letter codes. A=0, B=1, C=2, D=3, E=4, F=5, G=6, H=7, I=8, J=9.)

ADDING DEPARTMENTS

To add a department, type in a letter code (A-O), then press **ENTER**. When the cursor moves to the Name field, type in a department name. When configuring a store that uses a type-4 master scale, department A will reflect department number 0 at the master. It is helpful to add the department letter code as part of the description. (Example: 0 Meat Department, 1 Deli, 2 Service Meat, etc.). After typing the department name, press **ENTER** to advance to the password field, or **END** to save the record. To abort and exit, press **ESC**. If the cursor is in the password field, press **ENTER** or **END** to save the record.

MODIFYING DEPARTMENTS

To modify a department, type the department letter and press **ENTER**. When the cursor is on the Name field, type over the existing department name, use **ALT-D** to first clear the field then retype, or use **CTRL-RightCursor**, or **CTRL-LeftCursor** to move in the field and **BACKSPACE** to delete characters to the left of the cursor. Press **ENTER** to advance to the password field, or press **END** to save the record and exit. If the cursor is on the password field, press **ENTER** or **END** to save and exit. To abort the edit session at any time press **ESC**.

DELETING DEPARTMENTS

To delete a department, type in the letter code, then press **ENTER**. When the cursor advances to the name field, press the **F2** function key, and answer **Y** to "Ok To Delete Dept?". To abort or exit, press **ESC**.

Add\Modify\Delete Stores

The **Configuration** menu function **Add\Modify\Delete Stores** is used to configure the various departments and scales. Store **1** is reserved for a local store and is always the default store when starting **Intelli-Net**. Store 1 is the only store that will not use a modem to communicate with the scales. Store numbers 2 through 9999 are reserved for remote store locations and require a data phone number to be used to connect with the remote stores via modem.

For each store in the system, you must supply a store number, data phone number (for remote stores only), com port, baud rate, and department configuration which includes the department code, scale types, and scale address numbers for each department configured.

The **ADD/MODIFY/DELETE STORES** screen is shown in Figure 4.4.3.

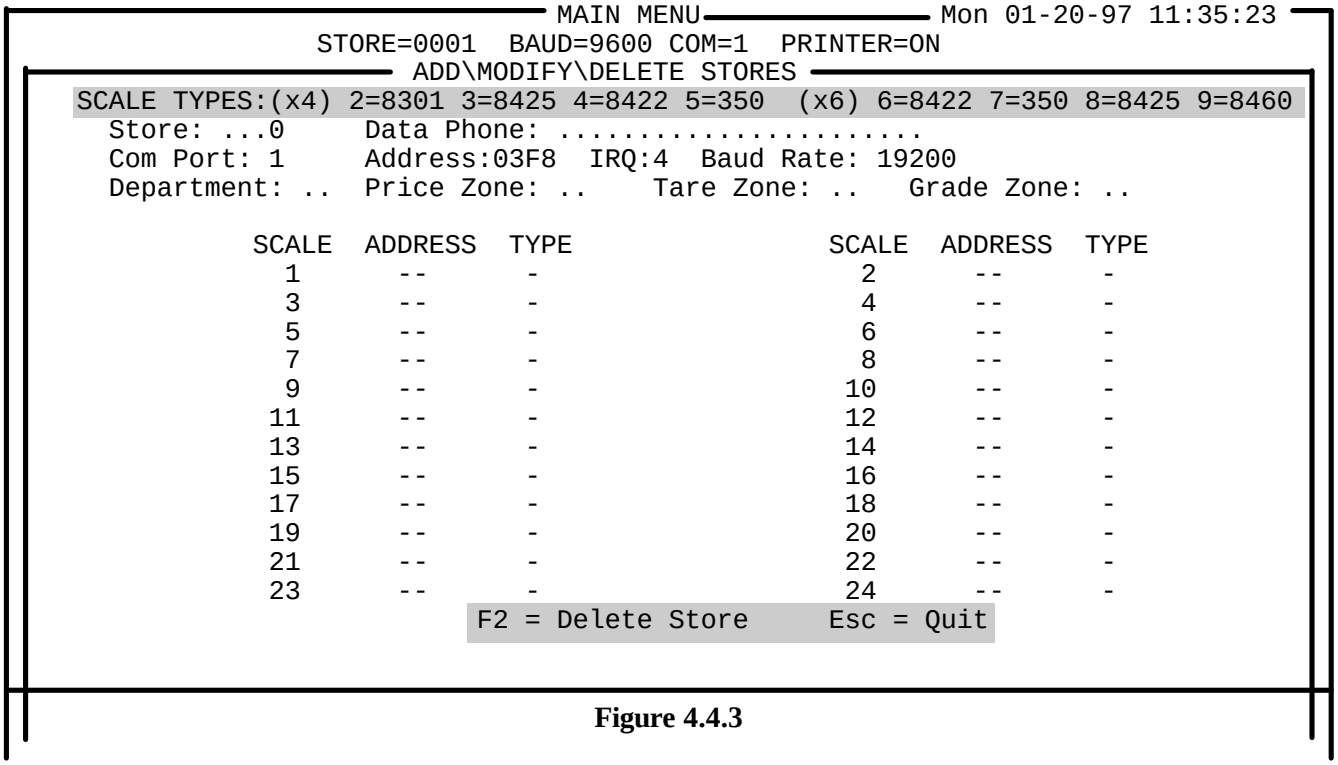


Figure 4.4.3

Store 1 is reserved for a local direct connected scale network only

To add a new store, select **Add\Modify\Delete Stores** from the **Configuration Menu**. See the **Add\Modify\Delete Store Records** editor screen, as shown in Figure 4.4.3. The cursor will be blinking on the **Store** field. If only connected to a local scale network, only configure the Store #1. To configure remote stores, use numbers 2-9999. Enter a store number (1-9999) and press **ENTER**. The cursor will then move to the Data Phone field.

In each field, type in the data, then press **ENTER** to advance to the next field. The cursor left/right keys can be used to move between fields. To move within the field, press and hold the Control key (**CTRL**), then use the cursor left or right keys. To delete an entry to the left, use the backspace key. To delete the entire field, press and hold the **ALT** key then press **D** (ALT-D). **On-line Context Sensitive HELP** is available for most fields by pressing the **F1** function key.

If connected to a non-touch tone phone system, enter the Hayes at command ATDP before typing in the phone number to tell the modem to dial out in pulse mode.

If entering a store number for a store that has previously been configured, the data fields will show the current store configuration when **ENTER** is pressed. The data fields can then be modified if required. If no change is needed, just press **ESC**. To delete an existing store configuration, type in the store number and press **ENTER**. Next, press the **F2** function key. Press **Y** to confirm the deletion, or press **N** to abort.

If configuring a local store, leave the data phone field blank (just press **ENTER**). If configuring a remote store, type in the phone number of the remote store (used to connect to the remote store's modem). Up to 32 digits can be programmed. A mux (multiplexer) code can be entered by using a "/"

(slash) followed by the code in the data phone number. This code will be sent after the modem connection has been established.

The com port can be selected from COM1 to COM4. The com port is the PC's asynchronous RS232 serial adapter card, and is commonly referred to as a "com port".

The first two com ports, COM1 and COM2 use a fixed industry standard address and IRQ (interrupt request vector) and cannot be changed. The other two com ports, COM2 and COM4, can be programmed with a different address and IRQ for special applications. If your PC has two or more com ports, one could be used for connection to a local store scale network, and the other com port could be used to connect with remote stores using a modem. Different baud rates can be used for different com ports. For example, you can use 9600 baud to communicate with local scales, and use 19200 baud for remote stores if your modem is a 28800 baud modem. If your PC does not have two separate com ports, a single com port can be used for both local and remote communications by using a manual switch to change between the local scale network and the modem.

The baud rate is the rate of speed of the data transmission. Using higher baud rates will reduce the transmission time between the scales and the PC. If most calls to remote stores will involve premium long distance phone costs, using a modem with a higher baud rate will lower the costs of the long distance calls. Selecting a 19200 baud modem over a 9600 baud modem, can reduce the transmission time considerably, thus saving on long distance phone call costs.

At the Department field, you will type in the letter code of the departments you have created in the Modify Departments Menu. This step will be used to configure the scales in each of the departments of the current store. Type in the department letter and press **ENTER**.

If the department is new, the cursor will advance to the Price Zone. Enter the Price zone (1-99) for the store. The cursor will then advance to the Tare Zone, so enter the Tare zone (1-10). Different prices and tares can be configured for each PLU record using zones. If only one zone is required, just enter 1 for the zone.

Next, the cursor will advance to the grade zone, so enter the grade zone for the current store (1-10). Different grade tables can be configured for each PLU record by using the grade zone. Press **ENTER** to advance to the Department field. Enter a 1 if only one zone will be used for grades.

The cursor will then advance to the Scale 1 Address column. Type in the scale address number that has been configured at the scale, then press **ENTER**. When asked for scale type, enter the type (2-9) that identifies the type of scale. A list of the type codes is at the top of the screen. When complete, press **ESC**. You can now enter another department, or exit by pressing **ESC** again.

If you enter the department code of a previously configured department, the current configuration will display. You must then select **Delete (D), or Modify (M), or Escape (E)**. Pressing **D** will delete the department from the store configuration. Pressing **M** will allow you to modify the scale configuration. In the modify mode, you can add new scales or delete current scales. To delete a scale from the department, move the cursor to the desired

scale, then press **<F2>**, then **Y** to confirm the deletion. If you want to quit and exit, press **ESC**.

Descriptions for data fields on the **Add\Modify\Delete Store Records** screen are as follows:

- **STORE** - Up to four digits, 1-9999, can be used for store ID numbers. Store #1 is reserved for a local store scale network. Use store number 2 through 9999 for remote stores that you will communicate with using a modem.
- **Data Phone** - The data phone is the telephone number used to connect with the modem at a remote store. Up to 32 digits can be entered. Do not put in slashes, hyphens, brackets, etc. A comma will be interpreted as a pause when used before the last digit. Commas after the last digit will be ignored. Leave this field blank when configuring Store #1. To use pulse dial as a default for systems not using tone, enter **ATDP** then the phone number. This will cause the modem to dial out using pulse dial instead of tone dial. If a mux (multiplexer) is in use to switch the modem between several ports, enter a "/" (forward slash) followed by the code. After the modems have established connection, this code will be sent over the phone line.

A control Character can be sent by entering a "^" (Shift 6 key) followed by the appropriate keyboard control code (ie…STX = ^B). See the ASCII chart in the Appendix of this manual.

- **Com Port** - The com port field is selectable from COM1 to COM4. This is the RS232 serial port or special device you will use to communicate with the scale network or modem.
- **Address** - COM1 and COM2 use an industry standard fixed address and cannot be changed. COM3 and COM4 can be programmed for different address settings. Type in the different address to change the field. Recommended settings are as follows:

TABLE 4.4.1

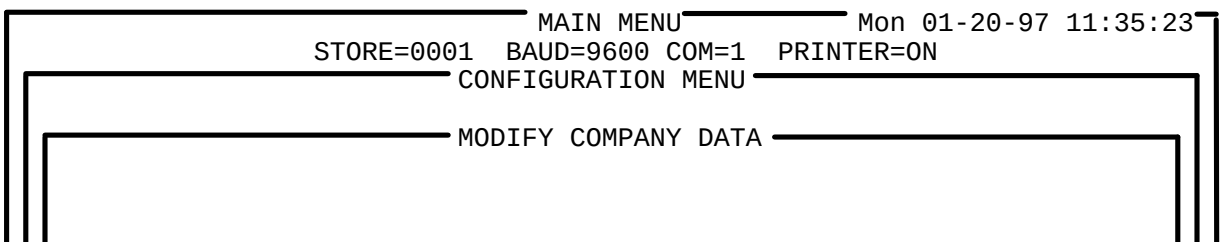
COM PORT	ADDRESS	IRQ
COM1	03F8	4 (Fixed)
COM2	03F8	3 (Fixed)
COM3	03E8	4 (Variable)
COM4	02E8	3 (Variable)

- **IRQ** - IRQ (interrupt request) settings for COM1 and COM2 use an industry standard fixed setting of: COM1 = 4, COM2 = 3. COM1 and COM2 cannot be changed. IRQ settings for COM3 and COM4 can be changed for special applications. Type in the new IRQ to change the field. Refer to the above table 4.4.1 for recommended settings.
- **Baud Rate** - Type in either 1200, 2400, 4800, 9600, or 19200 baud. This baud rate must match the scale baud rates or maximum modem baud rate (if used).
- **Department** - Up to 15 departments (A-O) can be configured per store.
- **Price Zone** - Up to (99) different price zones can be configured. By using price zones, different sets of prices can be maintained for the same PLU file.
- **Tare Zone** - Up to (10) different tare zones can be configured. Tare zones allow different tares to be maintained by store for the same PLU file.
- **Grade Zone** - Up to (10) different grade zones can be configured. Grade zones allow different grades to be maintained by store for the same PLU file.
- **Scale** - The numbers in this column are for reference on this screen only and are not used elsewhere in the program. Up to 24 scales can be configured per store.
- **Address** - This is a one or two digit number that matches the numbers programmed in the scales for the "Host ID" number.
- **Type** - Type is a single digit number used to classify a particular scale model or groups of scales that use a similar host protocol. Types for additional information. The scale type codes are identified as follows:

TYPE	MODEL\PLU TYPE
2	8301 Prepack Scale 4-Digit PLU
3	8425 Service Scale 4-Digit PLU
4	8422/8423/8305 Master 4-Digit PLU 8423SA/8427SA 4-Digit PLU
5	350 Printer 4-Digit PLU
6	8422/8423/8305 Master 6-Digit PLU 8427SA 6-Digit PLU
7	350 Printer 6-Digit PLU
8	8425 Service Scale 6-Digit PLU
9	8460/8461/8360 Master /8450SA/355SA

Modify Company Data

The **Configuration Menu** function, **Modify Company Data**, is used to enter the Master Password, the Supervisor Password, printer control codes, and display colors. The **Modify Company Data** screen is shown in Figure 4.4.4. Type in the data for the field, then press **ENTER**. The cursor arrow keys can be used to move to different positions on the screen. To move inside a data field, press and hold the **Ctrl** key, then use the cursor left/right keys to move to the left or right. To clear data in a field use the backspace key, or press and hold the **ALT** key, then press **D**. When the cursor is moved to any of the display color fields, use the PageUp/PageDown keys to toggle different display color selections or press **<F3>** to return to MONO mode. You can move to the Store Name field by pressing the **HOME** key. To save the configuration, press the **END** key When **OK To Update?** is displayed, press **Y** to save the configuration or **N** to redo the configuration. To exit without saving, press **ESC**.



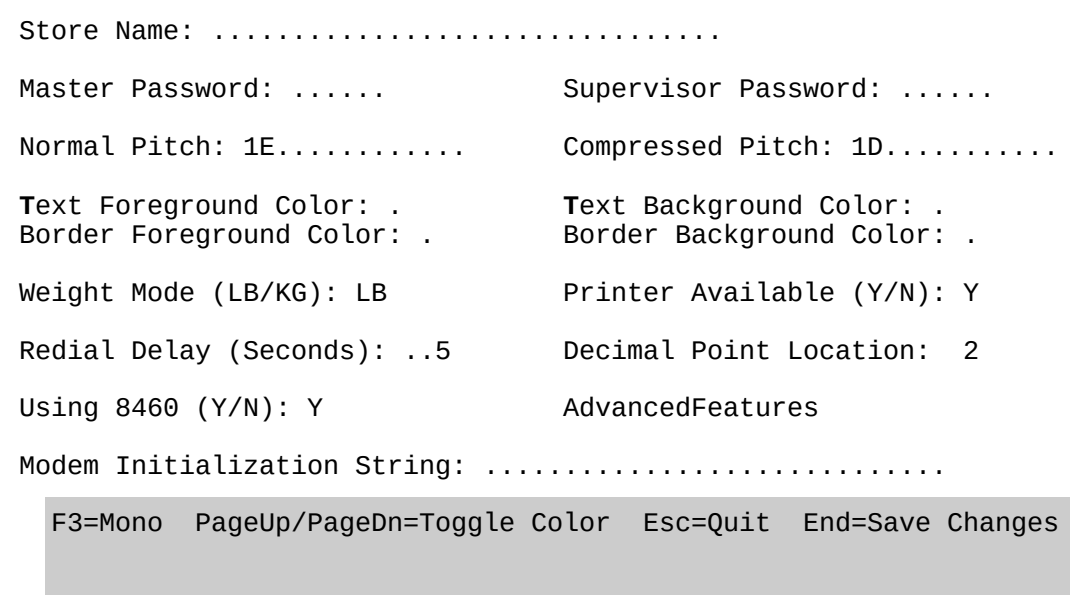


Figure 4.4.4

The data field descriptions for the **Modify Company Data** screen are as follows:

- **Store Name** - The Store Name, up to 32 characters, is used for Report Headings printed at the top of all configured reports.
- **Master Password** - A master password can be entered, using up to six characters, that will allow access to all **Intelli-Net** functions when the user logs in using the master password. If no password is desired, leave this field blank. Intelli-Net automatically converts all alpha entries to UPPERCASE characters.
- **Supervisor Password** - The supervisor password, up to six characters, allows access to all **Intelli-Net** functions except the **Configuration** menu. The supervisor password is case sensitive, Intelli-Net converts all entries to UPPERCASE characters. The user must log in using uppercase characters or the password will be invalid.
- **Normal Pitch Hex Code** - Up to 16 characters can be entered in this field for printer pitch. Certain **Intelli-Net** reports use both normal print and compressed print modes. This field can be left blank if your printer is capable of printing 132 columns. The printer must be able to accept software control codes in a hex format. Refer to your printer's User Guide for the correct hex codes for your specific model of printer. The normal print mode is normally printed in 10 to 12 characters per inch.

Refer to the printer manual for additional applications

- **Compressed Pitch Hex Code** - Up to 16 characters can be entered in this field. The compressed print mode is required for certain reports when using an 80 column printer. The compressed print mode will generally print 16.67 to 17 characters per inch.

PRINTER NAME	NORMAL PITCH	COMPRESSED PITCH
IBM Proprinter	12	0F (zero, F)

Okidata 192	1C	1D
METTLER TOLEDO 8840-0001	1B36	1B37
METTLER TOLEDO 8845-0001	12	0F (zero, F)
Toshiba 321	1B5D	1B5B
Epson	12	0F (zero, F)
Panasonic 1090/1091/1180	12	0F (zero, F)
HP Laser Jet II/III	1B287331302E3048	1B287331362E3648

- **Text Foreground Color** - (Color Monitors Only) The default colors for **Intelli-Net** are white text on a black background. If you are using a color monitor, the foreground text color can be changed by moving the cursor to the Text Foreground Color field, then pressing either the **PageUp** or **PageDown** keys to toggle through different color selections.
- **Text Background Color** - (Color Monitors Only) When using a color monitor, the background color can be changed by moving the cursor to this field, then pressing either the **PageUp** or **PageDown** keys to toggle through different color selections.
- **Border Foreground Color** - (Color Monitors Only) To select the foreground color of the screens, press either the **PageUp** or **PageDown** keys to toggle through different color selections.
- **Border Background Color** - (Color Monitors Only) To select the background border color of the screens use either the **PageUp** or **PageDown** keys to toggle through different color selections.
- **Weight Mode** - Enter either LB for pounds mode or KG for metric mode.
- **Printer Available** - This will be the default mode Intelli-Net will start up in. This can be changed for one session at the main menu after starting the program. **Y =** all data will be sent to printer. **N** = all normal printer output will be sent to the file **LOG.DAT**.
- **Redial Delay** - Enter the number of seconds of delay to pause before dialing the next store in an autodial session. This function is useful if your phone system experiences a delay before disconnecting the line and return to the dial tone.

Use <F3> key to return to the default color mode (MONO).

- **Decimal Point Location** - Enter the number of digits to come after the decimal point in the price.
- **Modem Initialization String** - Hayes™ AT software commands can be entered to setup the modem for custom applications using this field. Up to 20 characters can be entered in this field. Whenever the modem is accessed, commands showing up in this field will be automatically sent to the modem prior to dialing. To send multiple commands, separate each command with a forward slash /. (i.e. ATM0/ATE0/ATL1).
- **Using 8460's** - Enter **Y** (Yes) if you have any 8460's in your system. This selection determines what prompts will be displayed when editing a PLU. If there are no 8460's in your system, enter **N** (No). Prompts pertaining only to the 8460's will not be displayed. This will shorten

PLU editing time. If you add an 8460 to your system, be sure to change this prompt to **Y** (Yes).

- **Advanced Features-** Enter **Y** (Yes) if you have any 8360's in your system. This selection determines what prompts will be displayed when editing a PLU. If there are no 8360's in your system, enter **N** (No). Prompts pertaining only to the 8360's will not be displayed. This will shorten PLU editing time. If you add an 8360 to your system, be sure to change this prompt to **Y** (Yes).

Print Configuration Report

A record of all **Intelli-Net** configuration data can be printed using the **Print Configuration Report** selection. This record will show all entries made using the **Configuration** menu. This report can be used to verify data accuracy, and for a permanent file record. A sample report is below.

```
================================================================================

01-17-1997          METTLER -TOLEDO, Inc          PAGE  1
13:56:05            CONFIGURATION REPORT

********************************** Company DATA **********************************

COMPANY NAME: METTLER -TOLEDO, Inc

MASTER PASSWORD:    SUPERVISOR PASSWORD:


********************************* PRINTER DATA *********************************

NORMAL MODE: 1B5D    COMPRESSED MODE: 1B5B

******************************* DEPARTMENT DATA *******************************

CODE: A   NAME: MEAT   PASSWORD:

CODE: B   NAME: SERVICE MEAT   PASSWORD:

CODE: C   NAME: DELI   PASSWORD:

********************************* STORE DATA *********************************

STORE  PHONE                                COM  ADDRESS  IRQ  BAUD
-----------------------------------------------------------------------------------
   1                                         1     03F8     4   9600


   DEPARTMENT   ADDRESS   TYPE    PRICE  TARE  GRADE
   ----------------------------------------------------------------
       A           01     8460     1      1      1
       A           06     8460     1      1      1
       C           10     8460     1      1      1

================================================================================
```

Main Menu Functions

Following is a brief overview of the main menu with brief descriptions of the various main menu functions, listed in the order they appear in the **Intelli-Net** Main Menu. For additional information refer to each section later in this chapter.

Department Functions

Department Functions provides entry into a specific department's Department Functions Menu. When you select Department Functions, you are first required to select a department. After selecting a department, you will advance to the Department Functions Menu. Selections on this menu include:

Caution: If no master password is configured, all operators can access this function.

- **Pending File Maintenance** - Used to create, modify, activate or delete Regular, Extra Text, Sale, Action Message, Nutrition, or Graphics pending files.
- **Change Store Address Line In Scales** - New store address or message can be sent to scales in a department using this function.
- **Copy PLU File To Scale(s)** - This function is used to send the complete department PLU file to a selected scale. This function should be used if a scale's PLU file does not match the **Intelli-Net** master file after running a verify report, or when adding a new scale to the department.
- **Upload PLU File From Scale** - This function can be used to add (upload) an existing file in a scale to the **Intelli-Net** department PLU file.
- **Print Department Reports** - This function can be used to print the PLU list with or without extra text, hourly totals reports, zero movement reports, a commodity rack listing, and a price book report.
- **Display Current PLU/Production Data** - This function will display PLU data, including the extra text, nutrition facts, and graphics linked to the PLU record, as well as totals information for individual PLU records.
- **Add Production Data To Department** - This function allows adding a new scale's totals data to the department production totals file.
- **Erase All PLU's From Department** - This function will erase all existing PLU records in the department you are currently in. You must be logged into **Intelli-Net** with the master password in order to access this function.
- **Erase All Future PLU's From Department** - This function will erase all future PLU records (those which have not yet been activated) in the

department you are currently in. You must be logged into **Intelli-Net** with the master password in order to access this function.

- **Change PLU Numbers**- This selection will allow the PLU number for an existing record to be changed to a new unique PLU number.
- **Set All On-Sale Flags to Off** - This selection will toggle all PLU's with on-sale prices back to off-sale prices.
- **Copy Zones** - This selection allows tares, prices, and/or grades to be copied from one zone to another.
- **Add an existing PLU Directly to Scale** - This selection allows an existing single PLU to be sent to the scale without having to create a pending file.

Check Availability Of Scales

Check Availability Of Scales, is used to communicate to all of the scales configured in **Intelli-Net** for the store currently selected and report the status, either **On-Line**, **Off-Line**, or **Busy**. **On-Line** indicates that the scale is ready to receive any commands from Intelli-Net. **Off-Line** indicates the scale has not responded to **Intelli-Net**. This may indicate a malfunction and the scale in question should be checked. **Busy** indicates the scale may be involved in a transaction when the host attempted communication. If either a **Busy**, or **Off-Line** condition is reported, availability should be checked later to determine if the status changes to **On-Line**.

Copy Pending File To Scales

Copy Pending File To Scales, provides main menu access to this department function that is used to update the master file (regular pending files) and the scale's master files. This is the same function found on the Department Functions Menu, however, you can select a department and the associated pending files to update, perform the update, and then select another department to update without the need to go into the Department Functions Menu for each department you wish to update.

Miscellaneous Functions

Miscellaneous Functions, provides access to the Miscellaneous Functions Menu which includes:

- **Print/View Log File** - The log file contains information on unattended **Intelli-Net** operation and will report the success or failure of connections or any malfunctions that may have occurred. When the printer is disabled, only "View" will show on the menu. When the printer is enabled, you can either view or print the log file called LOG.DAT.

- **Create New Log File** - This function is used to clear the current log file of any previous data. If you have toggled the printer status to OFF, you should use this function periodically to clear the log file. This function should also be used before sending any reports to a disk file to clear the file of previous entries.
- **Import/Export Files** - This function is used to import or export data files used in Intelli-Net. The import function converts an ASCII file created with another program into a **Intelli-Net** data file. The export function will convert the **Intelli-Net** binary file format into a standard ASCII file that can be used by other programs.
- **Verify Scale Data For One Scale** - The Verify function can be used to compare the PLU file in a specific scale to the department PLU file in **Intelli-Net**.
- **Backup/Restore Data Files** -The **Intelli-Net** data files can be backed-up to a floppy diskette, or the data files on a floppy diskette can be restored in the **Intelli-Net** subdirectory using these functions.
- **Download Current Time To Scales** - Used to send the current time (set in your PC) to all scales on the network. (Note: *** is not applicable on 8422 and 8460 type scales)
- **Display Count Of ET/PLU Records** - This function will display the total count of PLU, Extra Text, Nutrition, Graphic, and Future Records in the Intelli-Net database, as well as the number of PLUs in each department.
- **Rebuild Database Indexes** - This function will repair damaged database index files in Intelli-Net. A possible error related to corrupt index files is I\O Error 100.
- **Change Default Directory** - This function allows changing to another subdirectory where other data files may reside. This allows using more than one master file.
- **Delete All Linked Records in the Scale** - This function will delete all records connected to a PLU by a linking code from the selected scale. This includes all extra text, nutrition facts, and graphics records. It does not include action codes.
- **Compress Memory in the Scale** - This function should be used after deleting several records from a scale's memory. When individual records are deleted, the space from which they are deleted is left blank, but it is not accessible until this Compress command is given. It compresses the remaining records, and compiles all the blank memory into one spot so that it is ready to receive and store new records. CAUTION: This command should only be used during periods when the scale is not being used.
- **Copy PLU's From One Department to Another** - This function can be used to copy a range of PLU's (based on PLU number) from one department to another.

Collect Production Data

Collect Active Production Data is used to collect production data from the scales. This can be an unattended operation and involves selecting the desired store(s) and departments to collect production totals. If the store(s) are remote, this function will automatically dial up the store(s) via modem. This function also allows selecting certain PLUs in certain departments only to be collected.

- Collect Obsolete Production Data is used to collect production data for PLU's that have been obsoleted. This function performs in the same way as Collect Active Production Data.
- Collect Operator Totals is used to collect operator totals from the scales. this can be an unattended operation and involves selecting the desired stores and departments to collect operator totals. If the store(s) are remote, this function will automatically dial up the store(s) via modem.
- Collect Both Active and Obsolete Production Totals is used to collect both active and obsolete production data via an unattended operation.

Print Reports

Print Reports is used to print: pre-configured production totals reports using data collected from the scales, the master PLU file listing, extra text file list, nutrition facts file list, action message file list, Collect/Print Cutting Test report, or Collect/Print Case Pulls report, and the future activation master listing.

Dial A Remote Store

Dial A Remote Store is used to dial up a remote store (via modem) and communicate with the scales on the remote store network. After connection, the **Intelli-Net** Main Menu will be displayed. The same menu functions can then be performed as if you are connected to a local scale network. This function can be used for manually updating a pending file, sending the department PLU file to a scale, etc.

Setup Autodial Session

When an autodial session has been initiated, the PC cannot be used for any other functions until the autodial session has been completed.

Setup Autodial Session, is used to setup an unattended **Intelli-Net** session to automatically dial up selected stores, update the scales with a pending file, and collect production totals. The session can be started immediately or programmed to start at a later time and date automatically. Intelli-Net can create script files that can be used to automatically setup a session that may be run frequently.

Transfer All Files to Master Scales

Transfer All Files To Master Scales is used to transfer any or all of the PLU master file, extra text file, action file, gradeline, nutrition file, and graphics file to a scale. This function is useful when setting up a new scale, or after initializing an existing scale's memory. Each file type selected will first clear that data from the scale's memory.

Extra Text Maintenance

Extra Text Maintenance is used to print or view extra text records, upload extra text records from a scale, clear all extra text records from a scale, send extra text records to a scale, and delete all extra text records.

Action Message Maintenance

Action Message Maintenance is used to print, view, or delete action message records.

Grade Table Maintenance

Grade Table Maintenance is used to add, modify, delete, view or print Grade Line records for up to ten different grade zones.

Nutrition Fact Maintenance

Nutrition Fact Maintenance is used to view, print, upload (from scales), clear, download (to scales), and delete nutrition records.

Graphics Maintenance

Graphics Maintenance is used to upload (from scales), clear, download (to scales), delete, import a pcx file, and print a report of the graphic records.

F2 - Function Key Toggle Printer Status

This selection will let you select PRINTER=ON, which will send data to the printer, or PRINTER=OFF, which will send all normally printed messages or reports to a file titled **LOG.DAT**. The file LOG.DAT is an ASCII text file that can be printed using the DOS PRINT command, or viewed using the Miscellaneous Functions Menu selection **VIEW LOG FILE**. The log file should be purged periodically or before sending reports to the file to clear any previous data. The file is purged using the Miscellaneous Functions Menu selection **CREATE NEW LOG FILE**. The default status

can be selected in the Intelli-Net Configuration/Modify Company Data screen.

F5 - Function Key Configuration

The F5 function key will allow access into the configuration menu if you are logged in with the master password. The configuration menu includes store configuration, scale configuration, com ports, baud rates, reports, screen colors, passwords, etc.

F10 - Function Key Disconnect Modem

This selection will only appear when connected to a remote store via modem. This selection will disconnect the modem from the remote store and return Intelli-Net to a local mode (Store 1).

Department Functions Menu

Many of **Intelli-Net**'s functions are department oriented and are accessed through the **Department Functions Menu**. These functions include pending file maintenance, sale file maintenance, transferring a department PLU file to a scale, etc.

To advance to the Department Functions Menu, select **Department Functions** on the main menu by pressing **D** or, or by highlighting the menu function using the cursor up/down keys (↑ or ↓) then pressing ENTER. Next, select a department, as shown in Figure 4.6.1. If passwords have been configured, you must be logged-on with a valid department password, or with the master or supervisor password, when you started the **Intelli-Net** program in order to select specific departments.

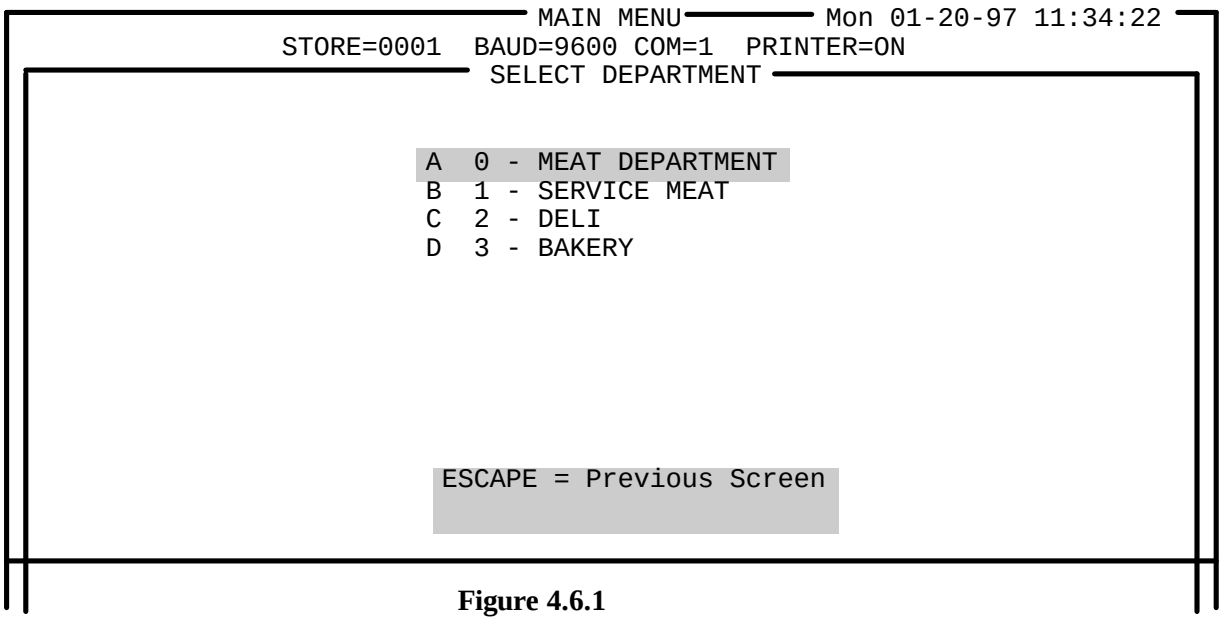


Figure 4.6.1

When using a type-4, type-6, or type-9 master scale with multiple departments, enter the scale's department number as part of the department name. This can help eliminate confusion using department code letters in Intelli-Net and department numbers in the master scale. For example: 0-Meat Depart (for dept A), 1-Service Meat (for B), etc.

The **Department Functions Menu** will now be displayed as shown in Figure 4.6.2.

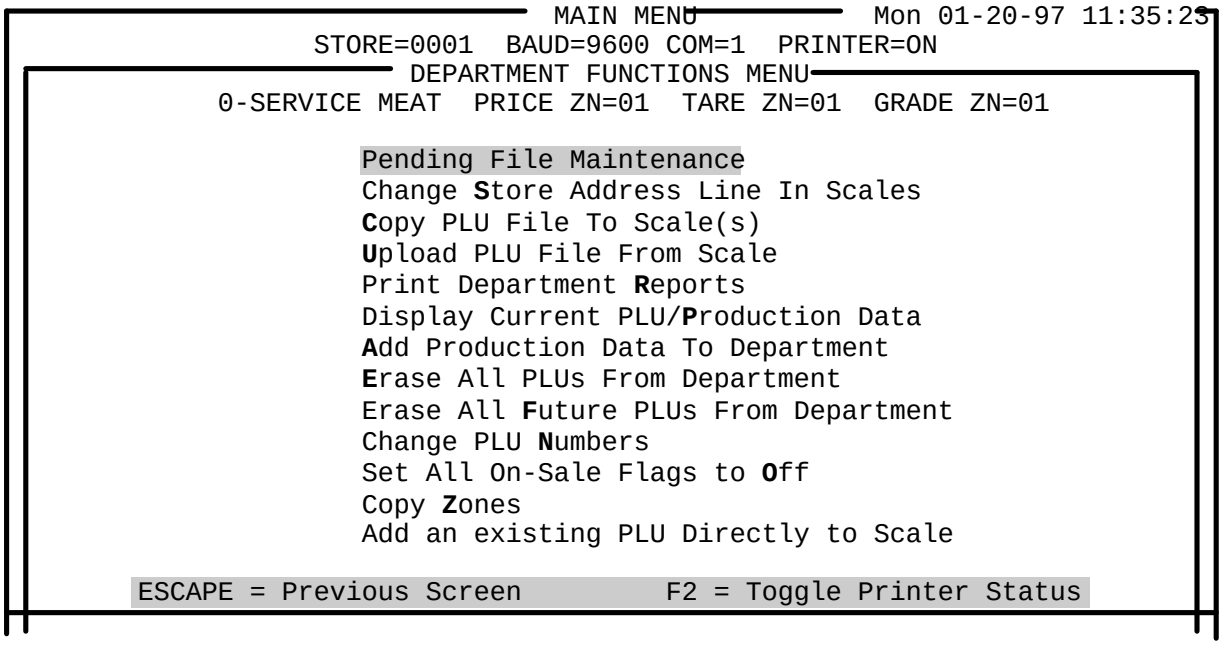


Figure 4.6.2

The sections starting with 4.6.1 will provide additional details for using the selections on the **Department Functions Menu**.

Pending File Maintenance

The first selection on the **Department Functions Menu** is **Pending File Maintenance**. This selection is used for creating, deleting, or editing pending files. It is also accessed to copy the pending files to the scales. Pending files are temporary files used to store updated data that will be later used to update the master PLU file in **Intelli-Net** and the scales. They can also be used to update the extra text, action message, nutrition, and graphics files in the scales. Pending files can contain new records, records to delete, and modifications to existing records.

Pending File Types

A pending file can be created and edited over several sessions and will not become part of the master file until selected to update the master file and scales. More than one pending file can be created for any given department and six different types of pending files can be used. The different types of pending files are as follows:

- **Regular Pending Files** - This type of pending file must be used when: adding new PLU records, deleting existing PLU records, or modifying existing PLU records.
- **Sale Pending Files** - Sale pending files are for temporary price-only changes to existing PLU records. When this type of pending file is selected, **Intelli-Net** automatically creates a **Sale-Off** pending file that contains the *pre-sale* prices for the same records selected in the sale pending file. The *Off-Sale* pending file can be used to change the sale prices back to the pre-sale prices after the sale period has expired.
- **Extra Text Pending Files** - This type of pending file contains additions, deletions, or modifications to be posted to the scale and/or master extra text file. This type of pending file is not valid for the model 8301C (type-2) and 8425 (type-3 or type-8) scales.
- **Action Message Pending File** - This file is used to update the scale action messages. This type of pending file is only valid for the type-4, type-6, and type-9 scales.
- **Nutrition Pending File** - This file is used to create or modify the Nutrition Facts printed on the label. Nutrition fact records are only valid for type 9 scales and model 8422M scales which have been upgraded to support nutrition facts records.
- **Graphics Pending File** - This file is used to add, modify, or delete the graphics records for type 9 scales.

Create A New Pending File - General Information

Pending files are department oriented. Up to 26 pending files can be created per department. To create a new pending file (starting from the main menu), you must select the following:

- **Department Functions** (From Main Menu.)
- **Any Department** (Select a configured department.)
- **Pending File Maintenance** (From Department Functions Menu.)

After selecting the above items, the **Select Pending File Menu**, as shown in Figure 4.6.3 will be displayed. Initially, no pending files are listed. Press function key **F10** to **Create New Pending File**.

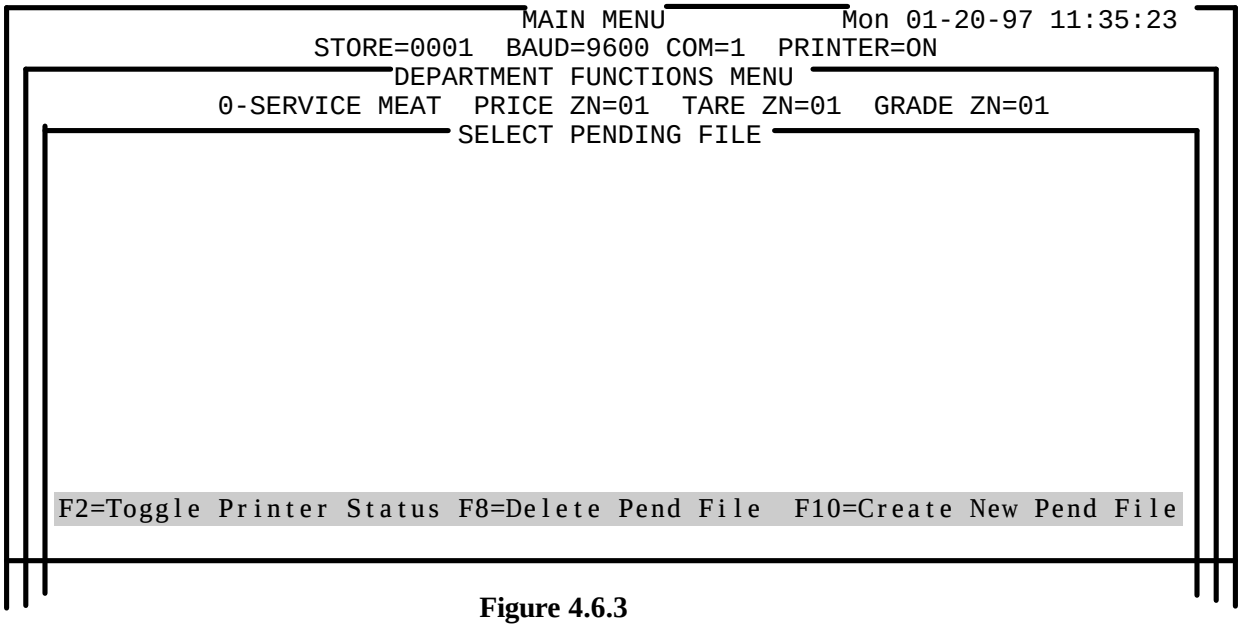


Figure 4.6.3

After selecting **F10=Create New Pending File**, you will be asked to supply the pending file type. Press the letter in parentheses for the file type as follows:

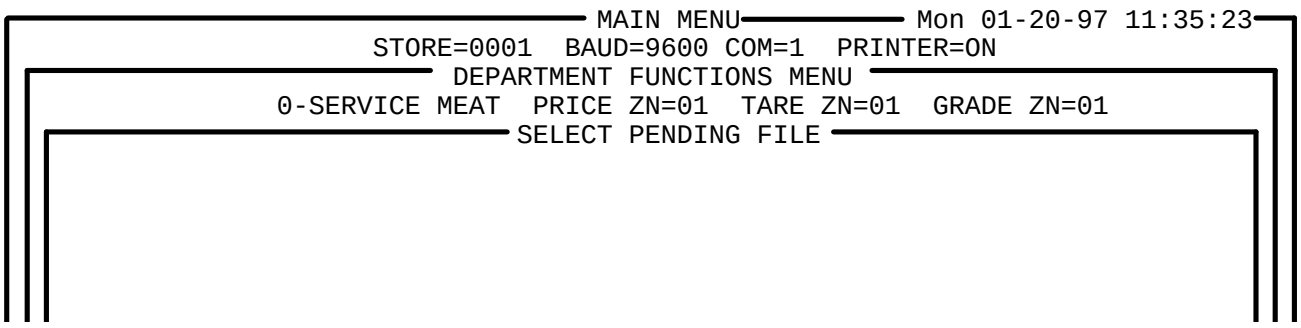
(R)egular (S)ale (E)xtra Text (A)ction Message (N)utrition or (G)raphics

Create A Regular Pending File

For this example, press **R** for regular pending file. You will next be asked to type in the name of the new pending file. The name of the file can be up to 16 characters long. This name is for your reference to identify what the file contains. After typing in the name of the file, press **ENTER**. You will be asked if this will be a future pending file. If you enter **Y** (Yes), followed by **ENTER** you will be prompted for an **Effective Time** and **Date**. All PLU's edited using this pending name will have their effective time and date set to the value entered here. You can still change the effective time and date while editing the PLU. The new pending file will then be added to the **Select Pending File Menu** list.

Type 9 scales can be set up for future activation by changing the Effective Time and Date if the prompt, "using 8460s" is set for "Y" in the Modify Company Data Configuration.

At this point, you now can select the new pending file. For this example, the name of the regular pending file is called CHANGES 08-25, as shown in Figure 4.6.4.



```
A. CHANGES 08-25.............REGULAR
```

```
F2=Toggle Printer Status  F8=Delete Pend File  F10=Create New Pending File
```

Figure 4.6.4

After selecting pending file **A. Changes 08-25**, the **Pending File Maintenance Menu** will be displayed, as shown in Figure 4.6.5. The department and name of the pending file will be visible on the top of the window. You can now perform any of the functions listed on the menu.

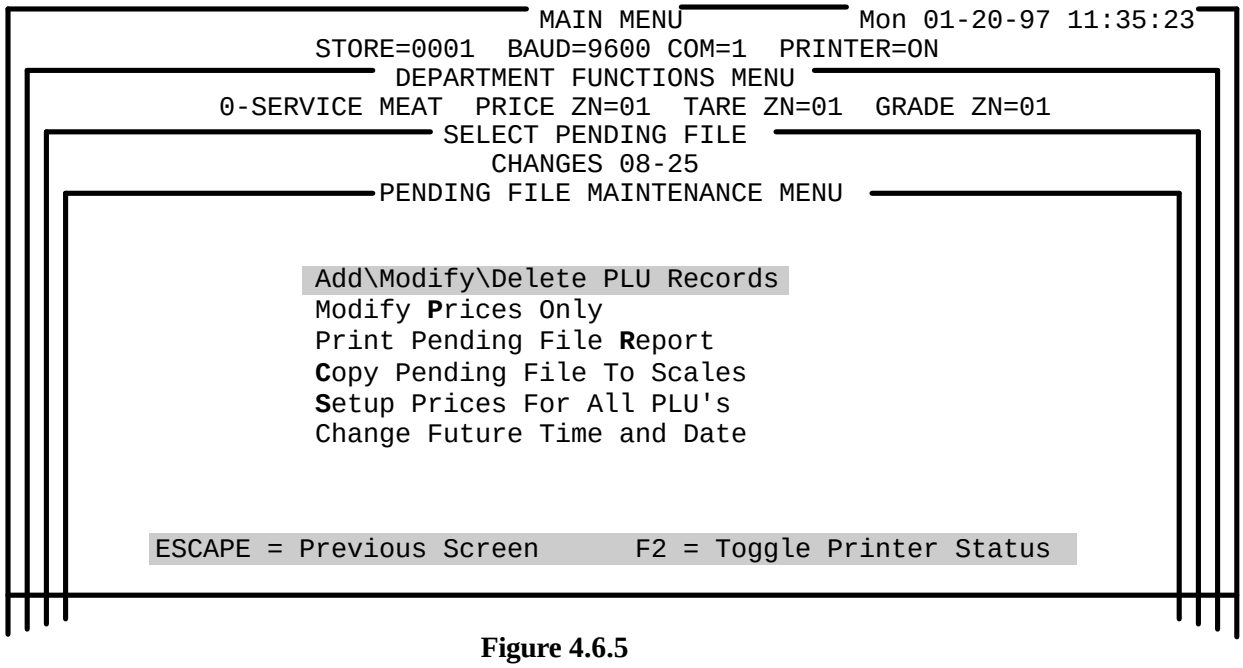


Figure 4.6.5

For the following example, select **Add\Modify\Delete PLU Records**. After entering the PLU number (between 1-999999) to create, the **ADD\MODIFY\DELETE PLU RECORDS** editing screen will be displayed, as shown in Figure 4.6.6.

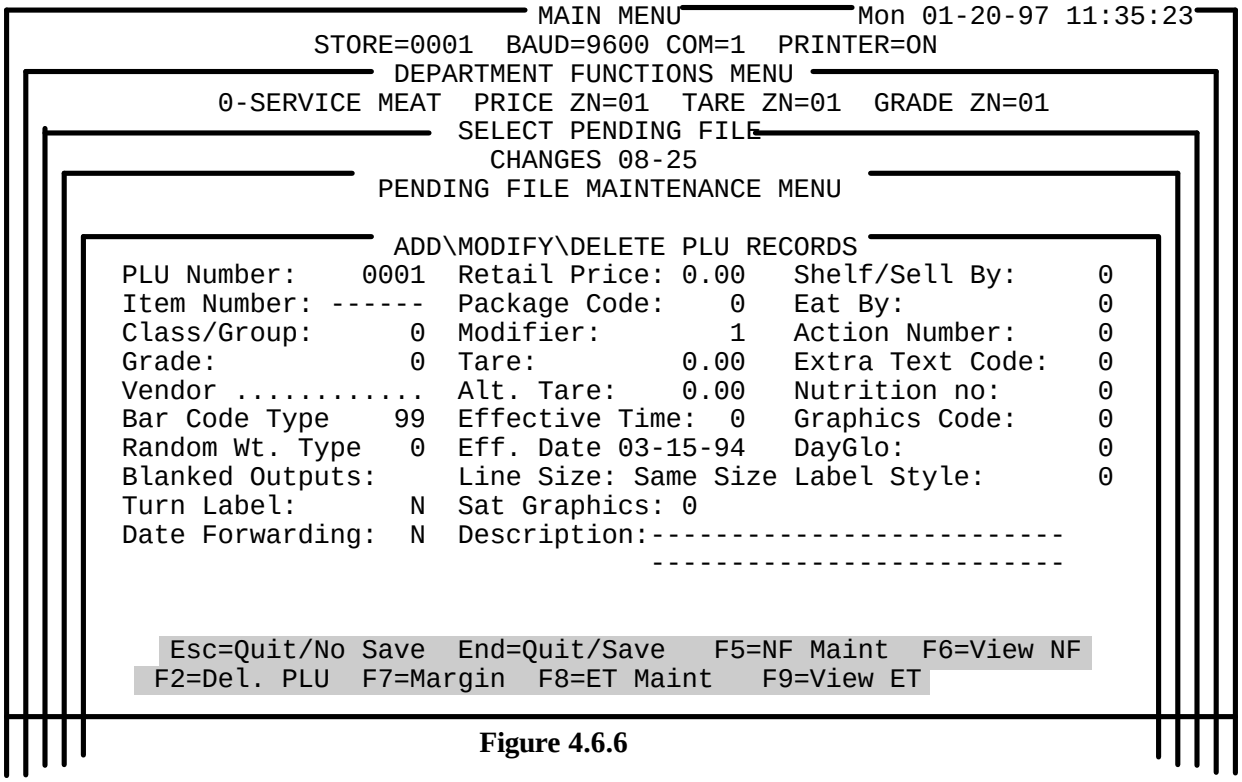


Figure 4.6.6

If the PLU number entered has already been setup in this pending file, the screen will show one of the following:

- **THIS PENDING RECORD EXISTS AS AN "ADD".**
- **THIS PENDING RECORD EXISTS AS A "MOD".**
- **THIS PLU IS MARKED FOR DELETION.**

If a number is entered for a PLU that was already edited using "Modify Prices Only", only the prices will be shown for that PLU, and the screen will display: Modify Pending Record

You can now type in data for the various PLU record fields. The cursor up/down and left/right keys, the Home key, and the End key can be used to move to the different areas of the editing screen. The **End** key completes the editing session and allows one to save changes to the pending file. Active function keys will always be displayed at the bottom of the screen. To move

left or right in the description field press and hold the **CTRL** key, then use the cursor left or right arrow keys. The data in a field can be deleted by using **ALT-D** (press and hold the ALT key, then press D). **ON-LINE HELP** is available for many of the different fields by pressing the **F1** function key.

A window listing available options is displayed for the following three fields: Bar Code Type, Random Wt. Type, and Blanked Outputs. To open the window, press the **F3** function key. The desired value can be selected by using the cursor up/down keys and pressing the **Enter** key. The **Esc** key will leave the value unchanged.

When multiple price or tare zones have been configured for different stores, the tare and price fields will show **ZONES**. When these fields are entered, a new window will display showing all of the configured zones. Examples of multiple price/tare editing screens are shown in Figure 4.6.7 and 4.6.8.

When you have finished editing zones, press **ESC** to advance to the next field.

An example multiple zone price editing screen is shown in Figure 4.6.7. To edit the zone fields, type the price, then press **ENTER** to move to the next zone. Press the **ESC** (Escape Key) when you are finished entering prices. Press F3 to recover the orginal price in the event that it was erased in error. Press **F10** for forced price. To set all the prices to the same value, press **F8**. Key in the price and press **Enter**.

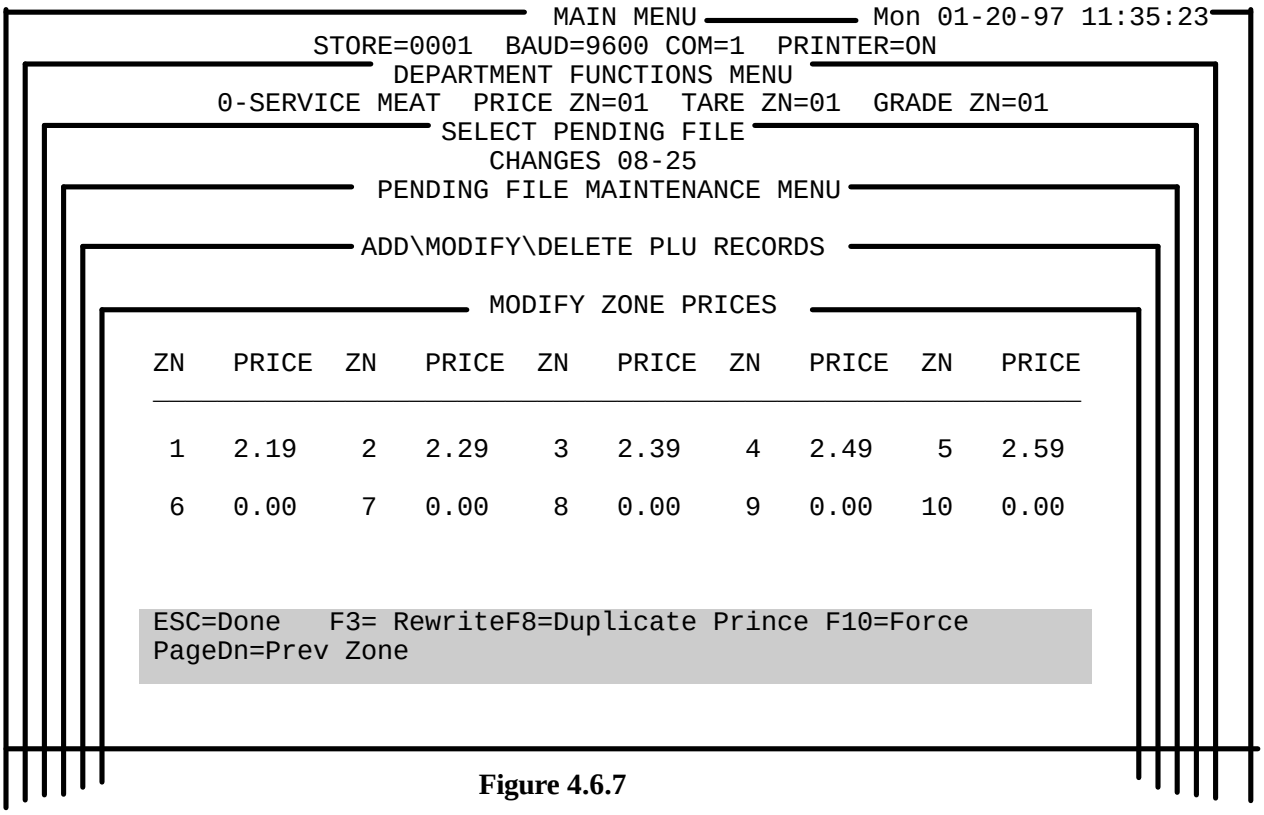


Figure 4.6.7

To edit the tare zones, type in the tare values, or press F10 for forced tare. Press **ENTER** to move to the next field. Press **ESC** when you are finished editing the tare zones. To set all tares to the same value Press **F8**. Enter the

value and press **ENTER**. All tares will be set to this value. The Alternate Tare Zones can be modified in a similar manner.

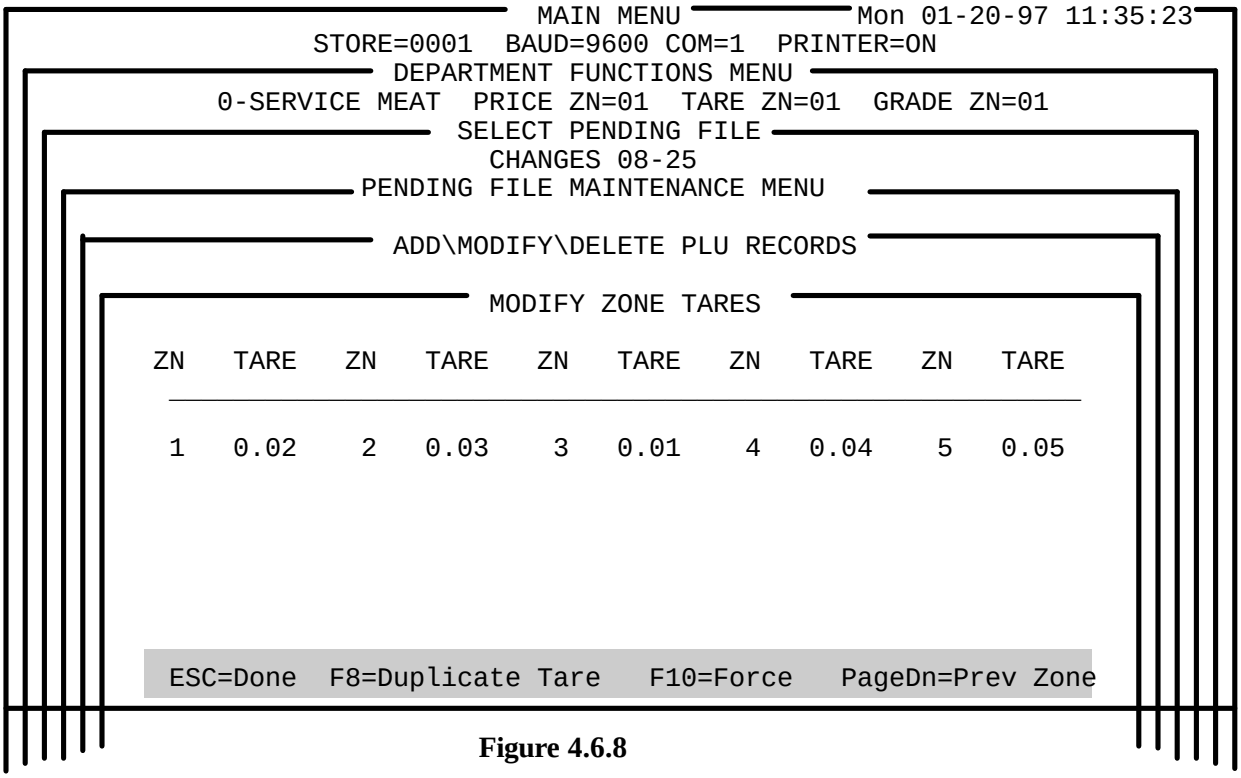
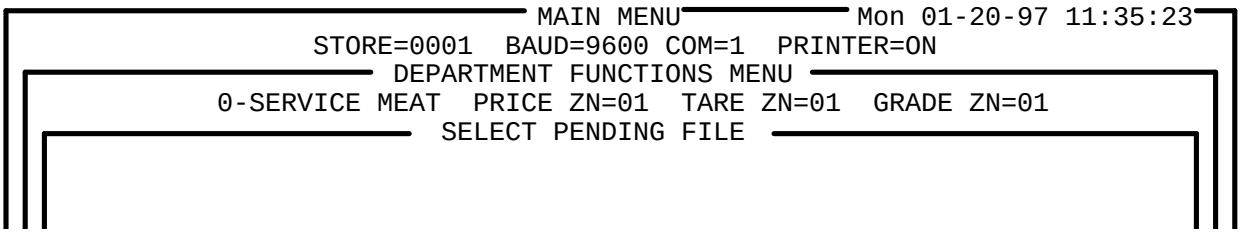


Figure 4.6.8

The description will be the last field entry in the PLU editor. When you press **ENTER** after the second line of the description, you will be prompted: **Save this Record to Pending File (Y/N):**, as shown in Figure 4.6.9. Press **Y** to update and continue, or **N** to start over. You can then continue to add records as needed. When you have completed adding records, press **ESC**.



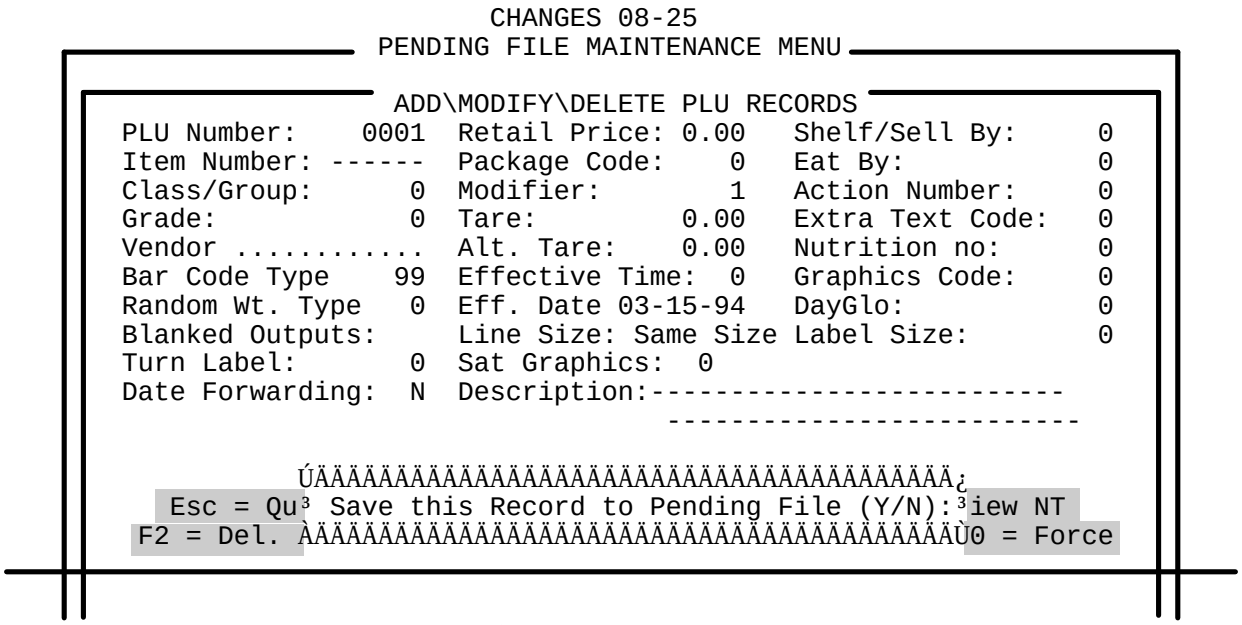


Figure 4.6.9

The PLU data field descriptions and requirements are as follows:

- **PLU Number** - This is the key number used to call up the individual records. The PLU number can be any number between 1 and 999999 (Do not enter any value greater that 9999 if you are setup for the four digit scale).
- **Item Number** - This is the manufacturers ID number that identifies the product. This number will be encoded into the printed UPC bar code when printing labels at a scale. The Item number can be a number up to ten digits between 1 and 9999999999 (You can only use the ten digit Item number if you are using 350 and type-9 scales). Most scales will not accept an item number = 0.
- **Class/Group** - Ranges of PLU numbers can be assigned to a specific class or group for reporting purposes.
- **Grade** - Grades can be assigned to PLU records that are referenced to grades 1-9 on the Type-4, 6, and 9 scales, or to grades 1-4 on the Type-2 8301 scales. The Type-4, 6, and 9 master scale grades must be programmed at the master and downloaded to the satellites before the grade will be printed. For no grade, enter a zero in this field.

The vendor for 8427's, number option is determined by the software version installed in the scale.

- **Vendor Number** - This is a ten digit number that can be utilized by most type 4, 6 and 9scales.
- **Bar Code Type** - By pressing **F3**, a pop-up window lists the available Bar Code Types, from which you can select one by highlighting it (with the up and down arrow keys) and then hitting enter. The available Bar Code Types include:
  - General Merchandise
  - Random Weight
  - National Drug & Nation Health

  - In-store marking of non-food items
  - For use on Coupons
  - Use scale setup

- **Random Wt. Type** - Again, by pressing **F3**, a window pops up from which you can select one of the following choices by highlighting it and hitting enter:
  - Price Check digit
  - Hard zero-price
  - 6 digit item number -- price
  - 5 digit price
  - Weight check digit
  - Hard zero - weight
  - 6 digit item number -- weight
  - 5 digit weight

- **Blanked Outputs** - This field allows you to select those fields which you do not want to see on the label. By pressing **F3**, a pop-up window displays the choices. More than one field can be selected by using the **Enter** key to select each choice desired. The **<F2>** key can be used to de-select a field. Use the **Esc** key to get back to the PLU editing screen. Options include:
  - Shelf Life
  - Use by
  - Pack date
  - Weight
  - Unit Price
  - Total Price
- **Retail Price** - The price per unit is entered in this field. The price can be any number between 00.00 and $9999.99. Up to 99 price zones can be configured. A Forced Price can be used by pressing the F10 key while in the price field to force the scale operator to manually enter the price when the PLU is called up at the scale.
- **Package Code/PLU Type**- The package code determines the price mode as follows:

  0 = By-Weight Pricing

  1 = By-Count Pricing

  2 = Fractional Pricing

  3 = Standard Pack Pricing

- **Modifier** - Up to two digits maximum from 1 to 99. The default of one will have no effect on package code or price. The modifier is used with the different package codes as follows:

Package Code	Modifier	Function
0	1	No effect. Per pound pricing in effect.
0	2-99	Enables Lb-For Pricing (Ex: 6 lb for $2.99)
1	1-99	Quantity of By-Count (Ex: 10 for $1.99)
2	2	Price will be per half pound.
2	4	Price will be per quarter pound.
3	1-99	Used for # pieces on later version software.

- **Tare/Net Wgt** - The tare can be any number between 0 and 99.99 lb. When the Package Code is a type 3 (Standard Pack), this field is where the net weight, in oz, is entered (decimal point is ignored for type-3 codes). A Forced Tare can be used by pressing the F10 key while in the tare field to force the scale operator to manually enter the tare when the PLU is called up at the scale.
- **Alt. Tare** - This field allows you to enter an alternate tare value that can be used instead of the first tare.
- **Effective Time** - The time entered in this field is the time on the Effective Date at which the PLU will become active. Type 9 scales can receive PLU records that will be activated in the scale at a future date and time. **Intelli-Net** allows you to create these future records. As the date/time comes for their activation, **Intelli-Net** will replace the current PLU record in it's master file with the future record, making it the active record. In this way, the PLU records in **Intelli-Net** will match the records in the Type 9 scale. This feature is only available on the Type 9 scale and they must be the only scale type used in the department.
- **Effective Date** - This is the day on which the PLU will become active. This feature is only available on the Type 9 scale and must be the only scale type used in the department in any of the configured stores.

Shelf/Sell By/Eat By: Using "255" will not blank the field on the 8450. See the blanked outputs field previously in this chapter.

- **Shelf/Sell By** - This value is the number (in days) that will be added to the current date to determine what will be printed on a label when the "Sell By" date is used. The valid range is from 0 to 255.
- **Eat By** - This value is the number (in days) that will be added to the current date to determine what will be printed on a label for the "Eat By" date is used. The valid range is from 0 to 255.
- **Action Number** - Numbers from 1-99 can be programmed to link an action message when using type 4, 6, and 9 scale. If an action message is not used, leave a zero (0) in this field.
- **Extra Text Code** - Up to six digits maximum between 1 and 999999 can be programmed to link an extra text record to the PLU record.

When an extra text code is linked to the PLU, the extra text record will be printed on a label when the PLU number is called up at the scale. If no extra text is used, leave this field zero (0). If a new or existing extra text code is entered, you can add or modify the extra text by pressing the **<F8>** function key. Existing records can be quickly viewed by pressing the **<F9>** function key.

- **Nutrition No.** - Up to 6 digits maximum can be programmed to link a nutrition facts record to the PLU record for a Type 9 scale and type 4, and 6 scales that have been upgraded for nutrition records. When a nutrition facts record is linked to the PLU, the nutrition record will be printed on a label when the PLU number is called up at the scale. If no nutrition fact record is used, leave this field zero (0). If a new or existing nutrition fact record number is entered, you can add or modify the nutrition record by pressing the **<F5>** function key. Existing records can be quickly viewed by pressing the **<F6>** function key.
- **Graphics Code** - Up to 6 digits maximum can be programmed to link a graphic to the PLU record for a Type 9 scale. When a graphic record is linked to the PLU, the graphic will be printed on the label when the PLU number is called up at the scale. If no graphic is used, leave this field zero (0).
- **Description** - The PLU description can contain up to two lines of 32 characters per line. When entering description, you do not have to insert trailing or leading spaces to center the text. The scales will automatically center the description.
- **Esc** - Quits the editing session without saving changes.
- **End** - Exits the editing session and prompts the user to save the changes.
- **<F2>** - Places the PLU in the pending file as a delete. This PLU record will be deleted from the scale and master file when the pending file is sent to the scale.
- **<F3>** - When used in the Bar Code Type, Rand Wt. Type, and Blanked Outputs, it will open a window listing the available options.
- **<F7>** - Allows you to enter the **Standard Cost** and based on your current retail price, **Intelli-Net** will calculate the margin percentage for you. This procedure can be reversed, which means you can enter the margin percentage and **Intelli-Net** will calculate the retail price.
- **<F5>** - This key brings up the Nutrition Facts Record Editing Screen, described in section 4.6.1.7, Create a Nutrition Facts Pending File. Here you can create or modify the Nutrition Facts Record whose number is entered in the Nutrition No. section.
- **<F6>** - This key allows you to view the Nutrition Facts Record whose number is entered in the Nutrition No. section.
- **<F8>** - This key brings up the Extra Text Editor screen, described in section 4.6.1.5, Creating an Extra Text Pending File. Here you can create or modify the Extra Text Record whose number is entered in the Extra Text No. section.

- **<F9>** - This key allows you to view the Extra Text Record whose number is entered in the Extra Text No. section.
- **<F10>** - When used in the Retail Price, Tare, or Alt. Tare fields, it allows you to force the scale operator to manually obtain a retail price or tare.

Create A Sale Pending File

From the Select Pending File window, hit the **<F10>** key to create a new pending file. Choose option S, the Sale Pending File. Enter a descriptive name at the next prompt. Two files will actually be created and added to the list, both an On-Sale and an Off-Sale pending file. Select the On-Sale Pending file for this example.

When you create a sale pending file, you will be asked if this will be a future pending file. Entering **Y** (Yes) followed by **ENTER** will set this sale file as a future sale file. You will be prompted for an effective time and date, and an "off-sale" effective time and date.

In a Sale Pending File, the only portions of the PLU records which can be altered are the prices, effective time, and effective date. Hence, once in the Pending File Maintenance Menu, select the Modify Prices Only option. The next screen will prompt for a PLU number. Enter it, and then the screen will show the price field(s) associated with that PLU number. A single price field will appear if no zones were configured, while multiple price fields will appear for each zone configured. Movement around this screen is similar to movement around the Regular Pending File screen. Change these prices as required, then press Escape when you are done.

Create An Extra Text Pending File

Extra text records are blocks of text that can contain ingredients, cooking instructions, advertising messages, recipes, etc. The extra text records are assigned code numbers which are used to link the code with PLU numbers. The extra text editor is used to create or modify or delete extra text records. To post changes to the master file and scale, you must create an extra text pending file from any department, and then copy the extra text pending file to a scale.

From the Select Pending File window, hit the **<F10>** key to create a new pending file. Choose option E, the Extra Text Pending File. Enter a descriptive name at the next prompt. Upon selecting this new file, you will see the EDIT/PRINT EXTRA TEXT PENDING FILE MENU. Choose Add/Modify/Delete Extra Text Records, and then you will be prompted for an Extra Text Number. Enter a number, and then you will be prompted for the Extra Text number to copy. If you choose to use an Extra Text file which was already created as a basis for this file, you could enter that number here. If not, just leave this prompt blank. The next screen to appear will be the Extra Text Editor. This is the same editor which will appear when **<F8>** is chosen from the PLU editing window.

The Extra Text editor screen will be displayed on the full screen as shown in Figure 4.6.10. If the extra text record is new, you will see a blank editor screen and can immediately begin typing the text. If you copied in an existing one, the screen will show the that text.

EXTRA TEXT EDITOR SCREEN

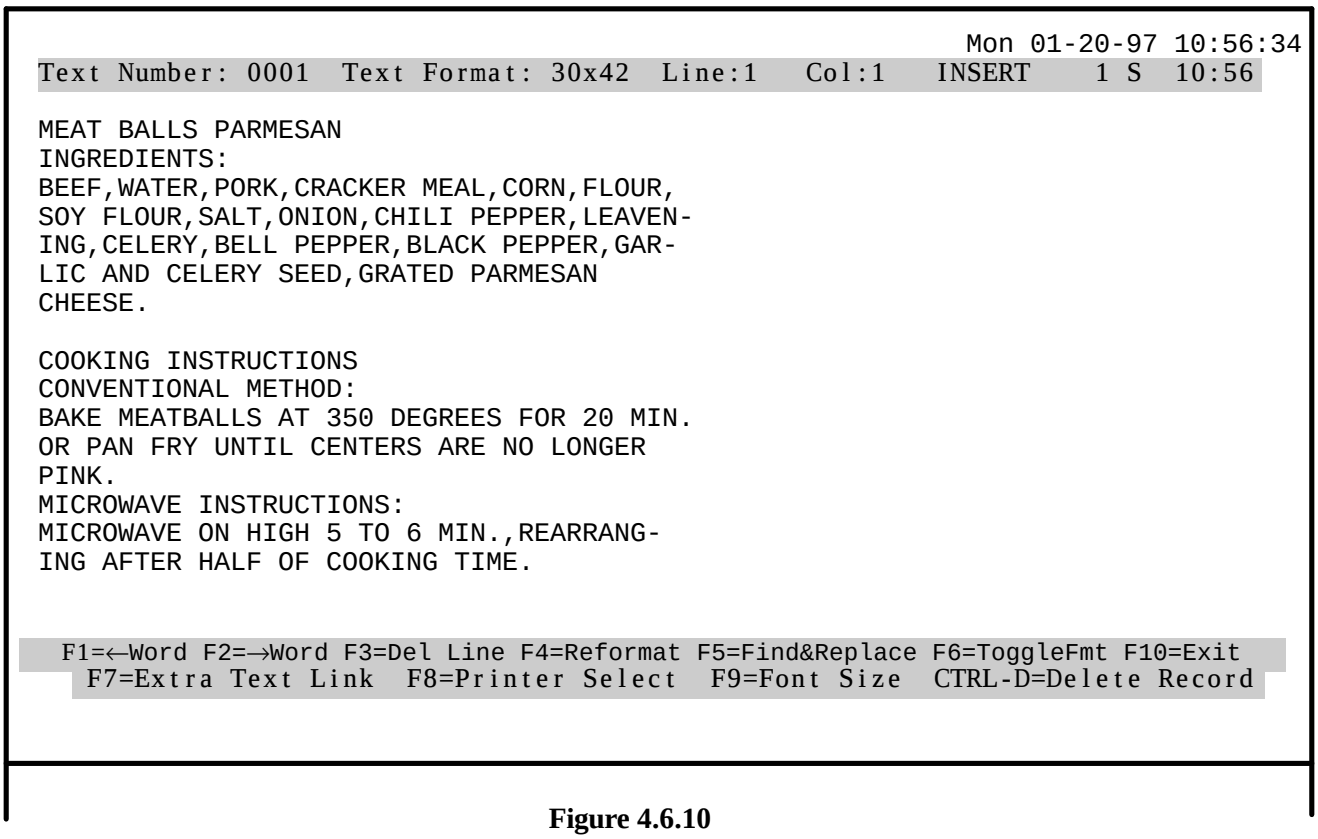


Figure 4.6.10

You can now modify the text as needed. The extra text editor contains an automatic line wrap feature which will format the lines as you type. If the text exceeds the selected line length (32, 42, or 54 characters), the text will automatically wrap to the next line. You only need to press **ENTER** to end a short line, or to advance to the next line leaving a blank line. The editor will also default to the **Insert Mode**. This means, if you place the cursor in any text and type a character, the existing characters to the right of the cursor will move once for each character typed. To overwrite existing text, press the **Insert** key to toggle to the **Typeover** mode. In this mode, any existing text over the cursor will be replaced with the new character typed. The **Insert** and **Typeover** modes are selected using the **Insert Key**. The text window will scroll up or down using the cursor keys to display text not shown in the window.

At the bottom of the screen, a status bar displays the active function keys.

The following is a brief description of the active keys:

KEY	FUNCTION
INSERT	Toggles Insert Mode and Typeover Mode. Insert mode will add text, moving any text above the cursor to the right for each character typed. Typeover mode will overwrite any text above the cursor.
DELETE	Pressing the Delete Key will erase any character above the cursor. If the Delete key is held down, any text to the right of the cursor will continue to be deleted.
BACKSPACE	Pressing the Backspace key will delete any character to the left of the cursor and move the cursor one space to the left.
→ ← ↑ ↓	Cursor Control Keys: right, left, up, and down. Pressing the cursor arrow keys will move the cursor in the direction indicated on the key. Used to move around in the extra text editor.
F2	Move cursor to next word right.
F3	Delete current line.
F4	Reformat text after making additions, deletions, etc.
F5	Find and replace text string. Used to search for text and replace with new text.
F6	Toggle (select) different label text formats.
F7	Extra Text Link used to chain two records together in a type-4 master scale.
F8	Printer Select. Used to select day-glo printer.
F9	Font Size. Used with day-glo printer to select the font size printed on the label.
F10	Exit from the extra text editor. When F10 is pressed, you will be asked to press **Y** to save and exit, **N** to re-enter the editor, or **Q** to quit and not save the current record when adding new records or quit and not save changes when modifying an existing record.

The 350 Printer requires an extra text record to set the label format to a size other than 0, which is for a 2.4 inch label with no extra text. When no extra text is assigned to the PLU record, Intelli-Net will set the default size to 2.4 inch, format 0. The extra text contains this code specifically for the 350 printer. If are not using extra text, but wish to set the label format to formats 1-8, create an extra text record with no text, but set to the correct format for the labels you will be using in the printer.

When the text is complete, press **F10**, then **Y** to save the file. To abort the procedure, press **F10**, then **Q**. Press **Y** to confirm the abort procedure. The text will not be saved when abort is selected.

Label Format

The default label format for new extra text records is 30 x 42. Once you are in the editor, you can use the **<F6>** function key to toggle the label format selections. Valid formats are:

7 x 32	10 x 42	11 x 32	15 x 42	99 x 32	
5 x 32	20 x 42	22 x 32	30 x 42	99 x 42	99 x 54

When using die-cut labels, the correct format code for each PLU record must be assigned. When using continuous strip labels, different formats can be selected. The 350 printer uses a format coded embedded in the extra text panel to format die-cut labels. If no extra text code is assigned to the PLU, the 350 will default to format code 0. To change the format using the extra text editor, press the **<F6>** function key to toggle between the formats. Just select the desired label format, and Intelli-Net will send the correct code to the printer. The 350 label formats and codes are as follows:

FORMAT CODE	LABEL SIZE	# LINES x CHAR/LINE
0	2.4"	0
1	4.2"	20 x 42
2	4.2"	15 x 32
3	3.7"	15 x 42
4	3.7"	11 x 32
5	3.3"	10 x 42
6	3.3"	7 x 32
7	5.1"	30 x 42
8	5.1"	22 x 32

The type 9 scale allows the extra text format to be defined at the scale and will word-wrap the extra text based on this format.

Create An Action Message Pending File

From the Select Pending File window, hit the **<F10>** key to create a new pending file. Choose option A, the Action Message Pending File. Enter a descriptive name at the next prompt. Then select this newly created file. In the EDIT/PRINT ACTION MESSAGE PENDING FILE MENU, select Add\Modify\Delete Action Message Records. You will be prompted for a new or existing Action Message Number. After entering this, the following screen will appear:

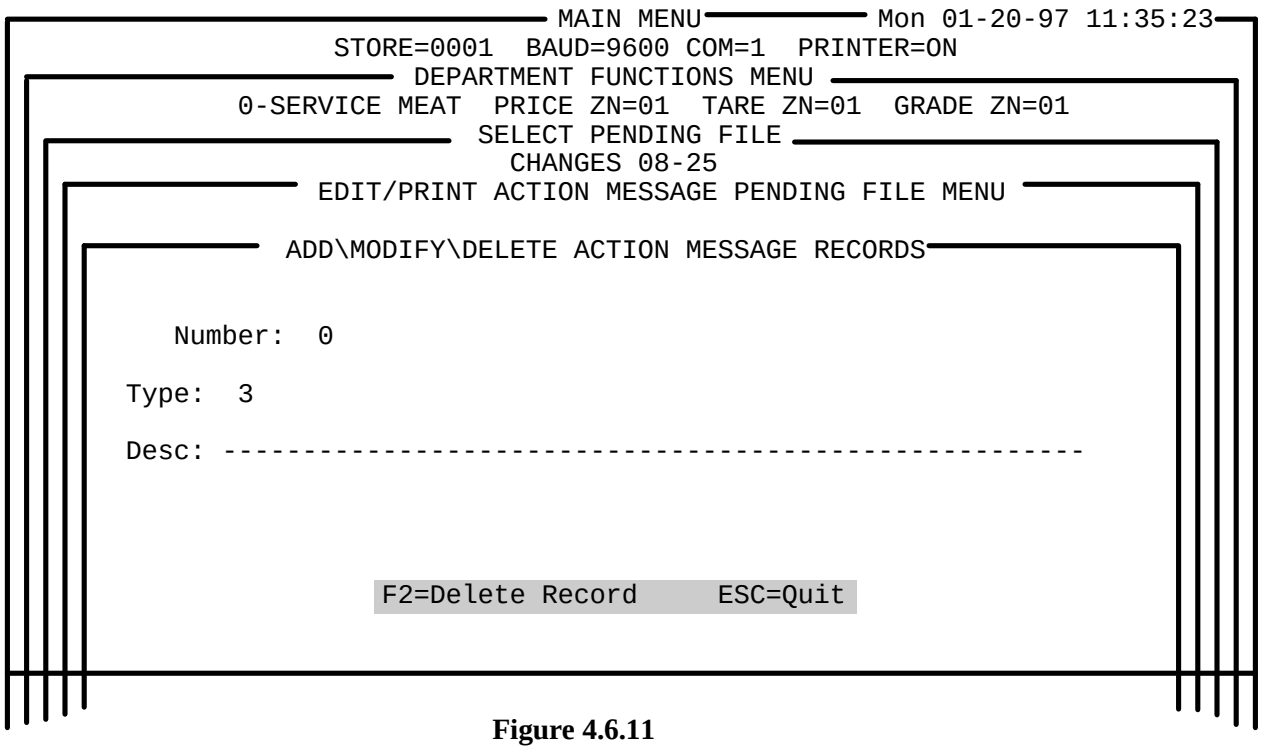


Figure 4.6.11

If you enter an action message number that does not currently exist, you can then type in the new information. If a number is entered for an existing record, the data fields will show the current records message. It can then be modified by typing in new data, or deleted by pressing the **<F2>** function key. After typing in the information for each field, press **ENTER**. When **ENTER** is pressed while the cursor is on the description field, you will see the prompt: **OK To Update Record? (Y/N)**. Press **Y** to save the record and enter another, or **N** to redo the record. Press **ESC** when the cursor is blinking on the Number field to return to the previous menu.

The action number record fields are described as follows:

Number Valid numbers are 1 to 50 for action message codes.

Type The action message type determines where the action message will be used by Type 4, 6, and 9 scales.

Type 1 - action messages will print on the store address line for PLU numbers assigned this action message. This message will overwrite the programmed store address line.

Type 2 - action messages will display on the scale's display screen when the PLU number is called up when this type of action message is assigned to a PLU number. The PLU description will not display when called up when this type of action message is programmed in the PLU record.

Type 3 - action messages are used for the scrolling marquee messages used in the type-4 scales. One or more type-3 action messages can be linked to display long scrolling messages on the scales when they are not in use.

Description The message field (description) can be any characters up to 63 characters long. To clear a complete line of text use **ALT-D**.

When used with the model 8427 or if a model 8305 is used with a 603 auto labeler, the action codes can take on a different meaning when accessed by these two scales.

Action Code Functions When Used With Model 8305

If the soft switches "Enable Wrapper" and "Enable 603 MSG" are enabled, the action codes will perform the following functions:

ACTION CODE #	TURN LABEL?	DISPLAY MESSAGE
1	NO	Feed Tray → Film 1
2	NO	Feed Tray → Film 2
3	NO	Feed Tray → Film 3
4	NO	Feed Tray ↑ Film 1
5	NO	Feed Tray ↑ Film 1
6	NO	Feed Tray ↑ Film 1
7	YES	Feed Tray → Film 1
8	YES	Feed Tray → Film 2
9	YES	Feed Tray → Film 3
10	YES	Feed Tray ↑ Film 1
11	YES	Feed Tray ↑ Film 2
12	YES	Feed Tray ↑ Film 3
13	NO	No Message to operator.
14	YES	No Message to operator.

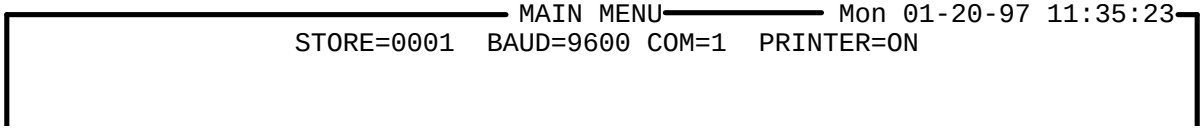
ACTION CODES WHEN USED WITH MODEL 8427

ACTION CODE #	ACTION	DESCRIPTION
48	Blank "Pack Date"	If pack date is in use, this action code will blank pack date. If pack date is not enabled, this action code will cause pack date to print for this transaction.
49	Blank "Julian Pack Date"	If enabled, this action code will blank the julian pack date. If disable, julian pack date will print for this transaction.
50	Enable/Disable Price Check Digit	If normally disabled, this action code will cause price check to print for a specific PLU number assigned this action code. If normally enabled, the price check will be disabled for the transaction.

Create A Nutrition Facts Pending File

Nutrition Facts are used to print nutrients, vitamins, minerals, and dietary information per 21CFR part 101 on labels. Nutrition facts are assigned code numbers which are used to link the code with PLU numbers. The nutrition fact editor is used to create, modify, or delete nutrition fact records. To post changes to the master file and a scale, you must create a nutrition fact record from any department, and then copy the nutrition fact pending file to a scale.

From the Select Pending File window, hit the **<F10>** key to create a new pending file. Choose option N, the Nutrition Pending File. Enter a descriptive name at the next prompt, then select this newly created file. In the EDIT/PRINT NUTRITION FACT PENDING FILE MENU, select Add\Modify\Delete Nutrition Fact Records. You will be prompted for a new or existing Nutrition Number. After entering this, the Nutrition Facts Editing Screen, shown in Figure 4.6.12 will appear. This is the same screen that will appear when **<F5> - NF Maint** is selected from the PLU record screen.



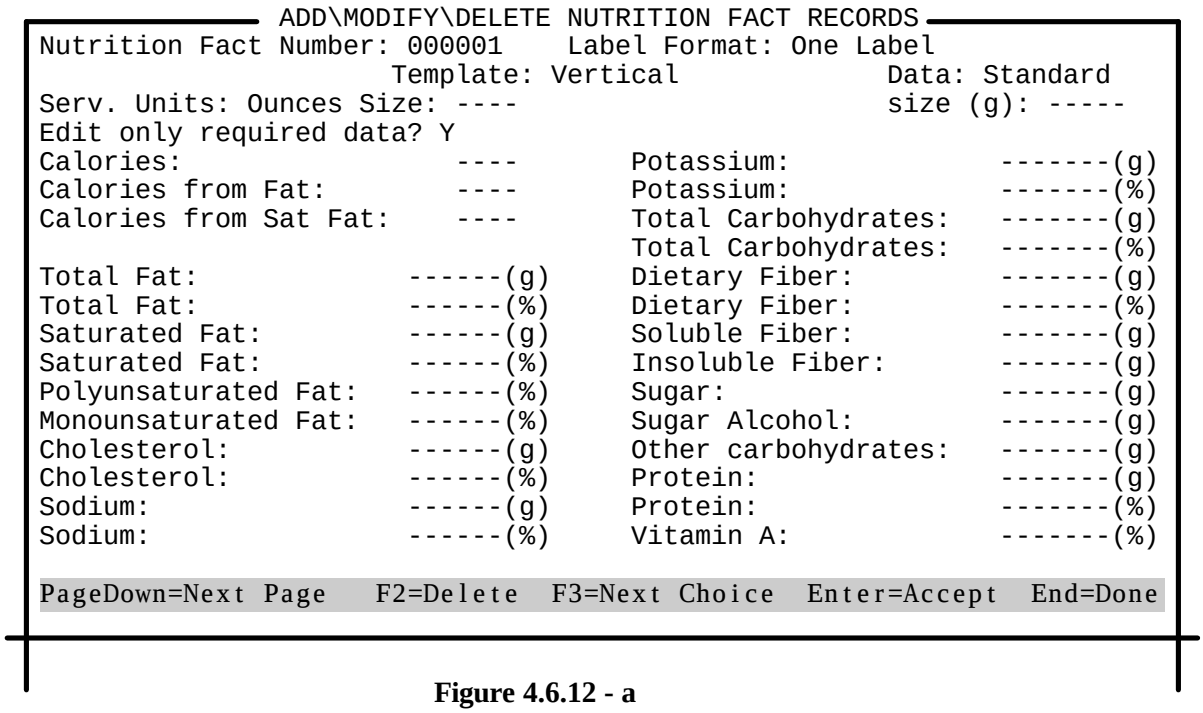
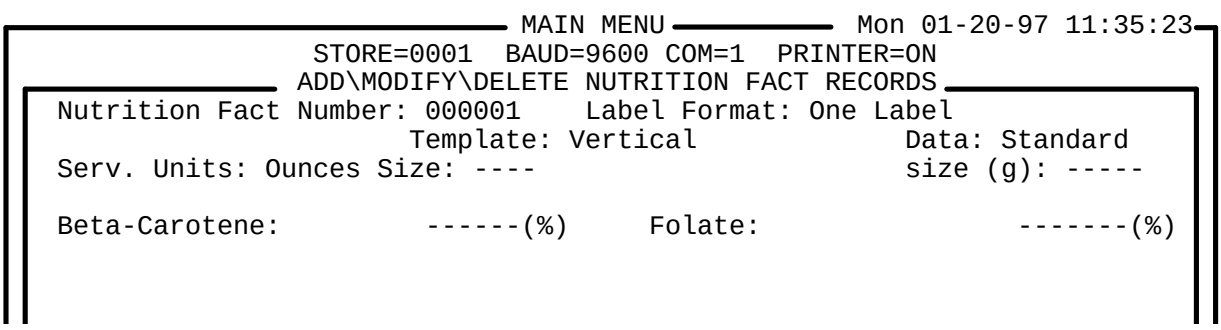


Figure 4.6.12 - a

If you enter **Y** to the prompt "Edit only required data" and sequence through the prompts by pressing the **ENTER** key, Intelli-Net will skip to only the nutrition facts that are required. This saves time in entering data. You can get to the non-required data fields by using the arrow keys.



```
Vitamin C:              ------(%)    Vitamin B12:            -------(%)
Calcium:                ------(%)    Biotin:                 -------(%)
Iron:                   ------(%)    Pantothenic Acid:       -------(%)
Vitamin D:              ------(%)    Phosphorus:             -------(%)
Vitamin E:              ------(%)    Iodine:                 -------(%)
Thiamin:                ------(%)    Magnesium:              -------(%)
Riboflavin:             ------(%)    Zinc:                   -------(%)
Niacin:                 ------(%)    Copper:                -------(%)
Vitamin B6:             ------(%)

               PageUp=Previous Page      F2=Delete       End=Done
```

Figure 4.6.12 - b

Note the menu bar which appears at the bottom of the screen:

<F3> Next Choice key can be used to look at and select other choices for label format, label order, batch mode, template, data, and serving units.

<Page Down> is used to edit the rest of the nutrition fact record (Figure 4.6.12 - b)

<F2> Delete places the nutrition fact record in the pending file as a delete. The nutrition fact record will be deleted from the scale and master file when the pending file is sent to the scale.

<End> Done exits the editing session and prompts the user to save the changes.

Create A Graphics Pending File

The type 9 scale is capable of supporting bitmapped monochrome graphic images for printing on the thermal label printer. Graphics files originate as a monochrome Microsoft Paintbrush (.PCX extension) file. To create this, open Paintbrush in Windows™. Pull down the Options menu, and select Image Attributes. In the window which pops up, select the Black and White Option (Color will not work), and the size of the graphic which is needed. When selecting the size, remember that the entire file must be comprised of less than 25,920 pixels. This translates into about 160 pixels (pels) by 160 pixels (pels) for a square graphic. This produces a graphic of about 1.67 inches square, or 4.24 cm square. Create the graphic, and then save it as a .pcx file, in the same directory as the **Intelli-Net** software.

Inside **Intelli-Net**, the graphic must first be imported. To do this, select Graphics Maintenance from the Main Menu. A new menu will appear (for more detail, see section 4.19). From this menu, select Import a PCX File into the Graphics Database. The next screen, shown in Figure 4.6.13, will prompt for the file name, a number to be given to it, and a description.

```
                              MAIN MENU            Mon 01-20-97 11:35:23
               STORE=0001  BAUD=9600 COM=1  PRINTER=ON
                        GRAPHICS MAINTENANCE

               Import a PCX File into the Graphics database
```

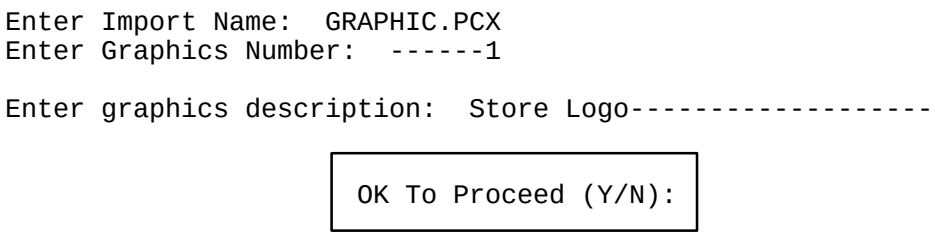


Figure 4.6.13

Answering yes to ‘OK To Proceed' will import the graphic into the **Intelli-Net** master database. Use the escape key to return to the Main Menu, then go back into Department Functions. Select a department, then choose Pending File Maintenance. Use the **<F10>** key to create a new pending file, and choose option (G)raphics. Enter a name for the file. In the next menu, select Add\Modify\Delete Graphic Records. A new window will appear, prompting for a Graphic Number. This window is shown in Figure 4.6.14. Once the number is entered, the name for the graphic (assigned when it was imported) will be shown. It asks whether the Graphic is an addition, a modification, or if it is to be deleted. Select (A)dd if this is the first time the graphic record will be sent to the scale.

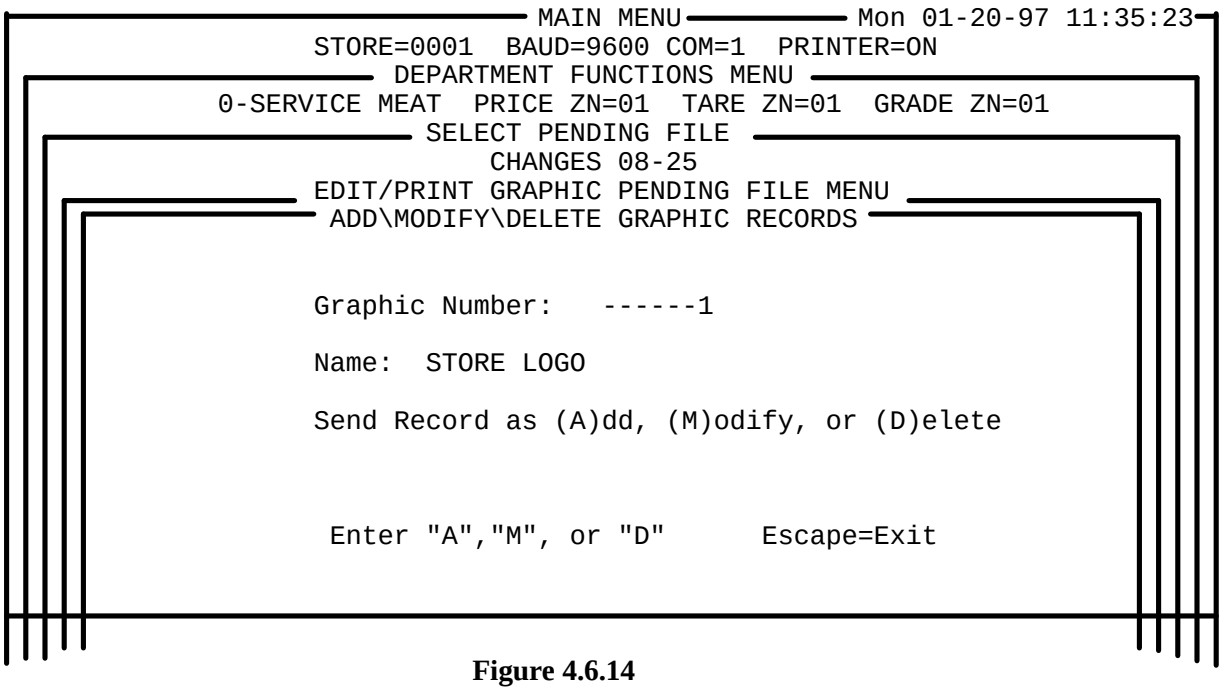


Figure 4.6.14

Pending File Maintenance Menus

Once the different types of pending files are understood, they can be treated basically the same way for the remainder of the pending file maintenance functions.

Add\Modify\Delete

The **Add\Modify\Delete** selection applies to all the types of pending files except sale files (PLU, Extra Text, Action, Nutrition Fact, and Graphic), as we have seen as we created each type. It must be used to: add all new records to the master file, modify existing records, or to delete existing records. If a record number is entered that does not currently exist in the master file, the data fields will be blank. You can then type in the data for the new record. If a number for an existing record is entered, the preprogrammed data will be displayed on the editor screen. You can then modify the data fields, or press **ESC** to exit without adding the record to the pending file. To delete an existing record, type in the record number, then press the **<F2>** function key. Press **Y** to confirm the deletion, or **N** to abort. Records selected for deletion will be deleted in the master file and scales when the pending file is selected for update.

Modify Prices Only

The **Modify Prices Only** function should be used when price-only changes to existing PLU records in the master file are required. This feature can be utilized in both regular pending files and sale pending files. The price-only change editor screen will prompt for the PLU number, then display the current price and description. If multiple price zones have been configured, all price zones will be displayed. No other data will be displayed when using the price-only change function. If a PLU number is entered for a non-existent record, an error message will display indicating the record does not exist. You must use the **Add\Modify\Delete PLU Records** function with a regular type pending file to first add the record in a pending file, then use the

Copy Pending File To Scales function to add the record to the scales and to the master PLU file.

Print Pending File Report

This function will print a report listing all entries in a selected pending file.

Copy Pending File to Scales

This function is used to update the scale records and the various **Intelli-Net** master files with additions, modifications, or deletions entered in a pending file for the department you are currently working in. Once the pending file has been selected for updating, the records in the pending file will become part of the permanent scale and master file records.

Setup

This function reads a bit differently for each of the five types of pending files it can be used for. For a Regular pending file, it reads:

Setup Prices For All PLU

When this is selected, a price-only pending file is created automatically using by loading the current master file prices for all department PLU's into a pending file. This pending file can then be used to update the scale prices to match whatever is in the master file. This function is useful if it is suspected that the scale prices do not match the **Intelli-Net** master file prices. It is fast because the PLU numbers do not have to be individually selected.

For an Extra Text pending file, this selection reads:

Setup All Extra Text Records

In a similar manner, all Extra Text Records for a department are automatically loaded into a pending file. This pending file can be used to update scale extra text records to be sure they match the master file's extra text records.

If you have selected an Action Message pending file, the selection will read

Setup All Action Message Records

In a similar manner, all Action Message Records for a department are automatically loaded into a pending file. This pending file can be used to update scale action message records to be sure they match the master file's action message records.

If you have selected a Nutrition Fact pending file, the selection will read

Setup Nutrition Fact Records

In a similar manner, all Nutrition Fact Records for a department are automatically loaded into a pending file. This pending file can be used to update scale nutrition fact records to be sure they match the master file's nutrition fact records.

If you have selected a Graphic pending file, the selection will read

Setup Graphic Records

In a similar manner, all Graphic Records for a department are automatically loaded into a pending file. This pending file can be used to update scale graphic records to be sure they match the master file's graphic records.

The function itself works basically the same way for all of these pending files.

Change Future Time and Date

(only used on regular, sale, and off sale pending files).

This function allows a pending file to be made into a future pending file. An effective time and date can be entered so that any PLUs edited will automatically have the entered effective time and date. This function also gives you the option to change all existing pending records to the new date and time.

Change Store Address Line

Intelli-Net provides a function to create a two line store address or message that can be sent to scales in a specified department. The store address will be stored in the scale and will print on the last two lines of a label. This function is department oriented and will be sent to all valid scales in the department. Each department can use a different store address. An example entry screen is shown in Figure 4.6.15.

The model 8301C prepack scale uses a different method for entering store messages. The message is programmed as a regular PLU record with the characters **ZX** preceding the description. The PLU description will be the one line store address. Whenever the PLU is called up at the scale, the code **ZX** will tell the scale's printer to print that record on the last line of the label.

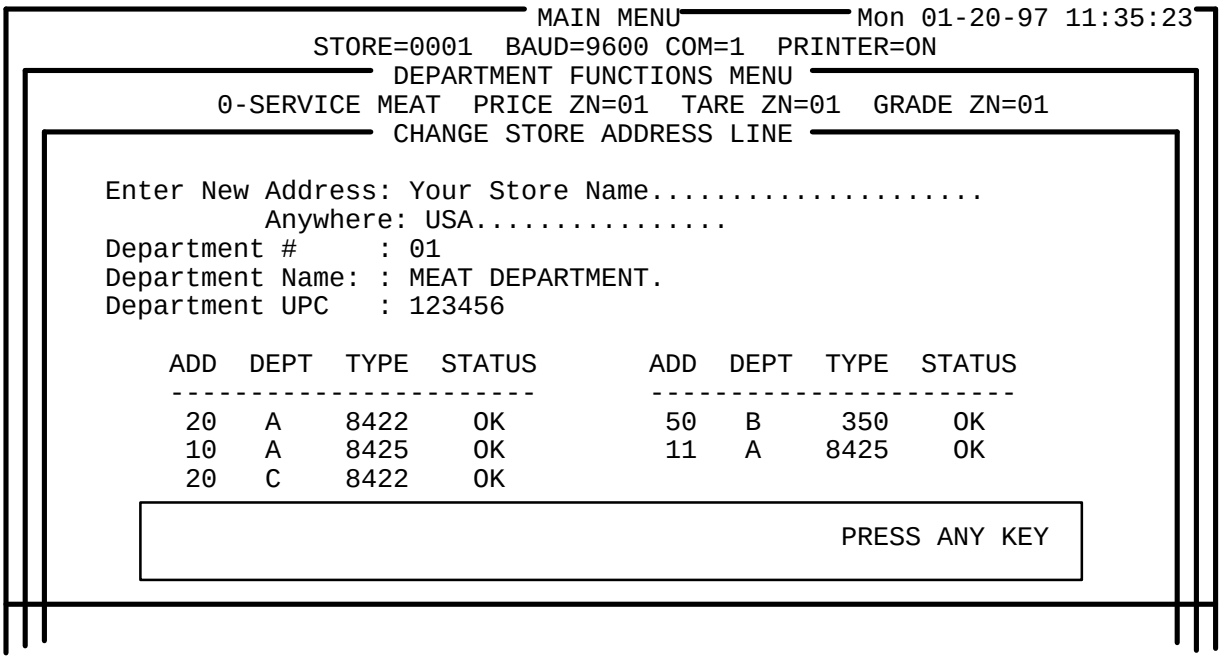


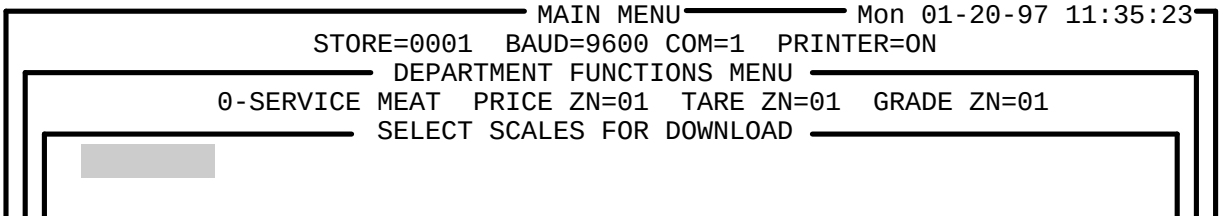
Figure 4.6.15

Copy PLU File to Scale(s)

The copy PLU file to scale(s) function will clear the scales production totals accumulators. Collect production data from the scale first before using this function to record the production totals in Intelli-Net.

The department function, **COPY PLU FILE TO SCALE(s)**, can be used to send the complete **department** PLU file to a selected scale or to all scales in a department, over-writing any existing records that may exist in the scale(s). When this function is used with a type-4, type-6, or type-9 scale, the existing PLU records for the department will first be deleted before the department PLU file will be sent. When sending the department PLU file to the other non-department oriented scale types, the department PLU file will over-write the existing file in the scale. This function should be used if a verify scale data report shows discrepancies between the scale file and the master file.

An example screen is shown in Figure 4.6.16. Figure 4.6.16 shows scale address number 20 was selected in department A. The scale type is 8422. To select a scale, highlight the scale address number using **ENTER** or by the use of the cursor left/right keys, then press **ENTER**. Press **<F7>** to select all listed scales. Press **<F2>** to deselect a scale.



```
20-8422  10-8425 11-8425


<ENTER>=Select  F7=Select All  F2=DeSelect  ESC=Done Selecting
```

Figure 4.6.16

When you are finished selecting scales, press **ESC**, then **Y** to continue, or **N** to abort the procedure. If you continue at this point, the screen will prompt "Download Future Activation Records (Y/N)?" A scale status message will then display on the lower half of the screen, as shown in Figure 4.6.17. PLU numbers being downloaded will display under the STATUS column indicating the department and PLU number. Any error conditions will also display under this column. If you are sending to multiple scales and wish to advance to the next scale, press **ESC**. When the procedure is complete, press any key to return to the Department Functions Menu.

```
                              MAIN MENU              Mon 01-20-97 11:35:23
                  STORE=0001  BAUD=9600 COM=1  PRINTER=ON
                        DEPARTMENT FUNCTIONS MENU
            0-SERVICE MEAT  PRICE ZN=01  TARE ZN=01  GRADE ZN=01
                        SELECT SCALES FOR DOWNLOAD
  20-8422  10-8425 11-8425
```

```
ADD    DEPT    TYPE    STATUS        ADD    DEPT    TYPE    STATUS
-------------------------            -------------------------
 20     A      8422    A 0001
```

Figure 4.6.17

Upload PLU File from Scale

An existing file in a scale can be uploaded into **Intelli-Net** to create a new department PLU file, or to upload new price or tare zones. You will be asked if you would like to **OVERWRITE THE EXISTING FILE (Y/N)**. If you select Yes (Y), any records uploaded that already exist in the scale will be overwritten with the uploaded record. If you select No (N), only the price, grade, tare, and alternate tare will be changed.

The upload function can be used in the following instances:

- **Create a new master file**. To create an initial master file, PLU records from an existing scale can be uploaded into a selected department. If the scale type is type-4, type-6, or type-9, the departments that exist in the scale must match the departments selected for uploading into **Intelli-Net**.
- **Disaster recovery.** The upload function can be used to recreate the Intelli-Net Master Database in the event of hard disk failure when no backup is available.

An upload screen is shown in Figure 4.6.18, using scale 20, in department A. The upload progress screen shows the **ADD** which is the scale address number, the **DEPT** (department), the **TYPE** of scale, and the **STATUS** which lists the current department and PLU number being uploaded to Intelli-Net.

```
MAIN MENU  Mon 01-20-97 11:35:23
STORE=0001  BAUD=9600 COM=1  PRINTER=ON
DEPARTMENT FUNCTIONS MENU
0-SERVICE MEAT  PRICE ZN=01  TARE ZN=01  GRADE ZN=01
UPLOAD PLU FILE FROM SCALE

Enter Scale Address:  20          OVERWRITE EXISTING FILE

 ADD    DEPT    TYPE    STATUS
 -------------------------
  20     A      8422    A 0001
```

Figure 4.6.18

8450SA/355SA can only upload/download one department at time.

When the upload is complete, a new window will be displayed showing the department PLU files that have been uploaded. If the scale is a type-4, type-6, or type-9 master scale, more than one department may be uploaded. At this point, the PLU file has not been added to the Intelli-Net master data base. You may select all or specific departments to post to the Intelli-Net master data base. Figure 4.6.19 shows the select department to post screen. To select a department, highlight the desired department(s), then press **ENTER**, or to select all departments, press <**F7**>. To deselect a department, move the cursor to a highlighted department then press <**F2**>. When you are finished selecting departments, press <**F10**>.

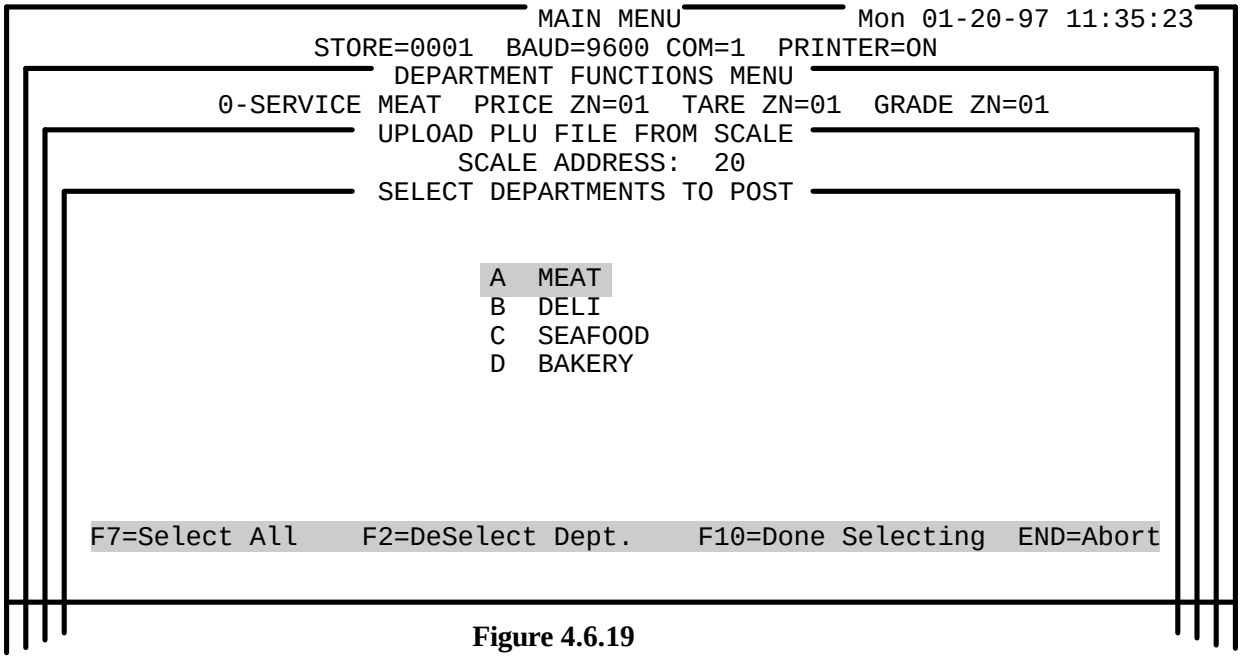


Figure 4.6.19

Print Department Reports

Various department oriented reports can be selected for printing in this menu. These type of reports are fixed formats and are not configured using the Intelli-Net Configuration Menu selections. Each of the reports can be sorted by **PLU, Item, Group or Vendor** number (The secondary sort key is based on PLU and Item number). You can also enter the range of the PLU numbers that you want to be printed (Starting PLU number and ending PLU number). The types of reports available are as follows:

Print PLU File Listing Without ET

A PLU list for the department PLU file can be printed that will show all of the department's PLU records. The prices and tares will be listed according to the configured zones. The report can be sorted by PLU, Item number, or group. The report can be aborted at any time by pressing the **ESC** key. An example of the report format sorted by PLU is as follows:

--- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- ------ --- --- --- --- ------ --- --- ---

```
01-17-97                METTLER TOLEDO                PAGE 1
13:13:00                PLU FILE LISTING
                        MEAT DEPARTMENT

PLU#  ITEM#                                  PKG          CLASS/     SHELF EAT  ACTN    ET     NF    GRAPHIC  DATE OF
VENDOR#        DESCRIPTION                   COD   MOD    GROUP      LIFE   BY  CODE    CODE   CODE  CODE     CHANGE    SALE
-------------------------------------------------------------------------------------------------------------------------
000001 000001  EXTRA LEAN GROUND BEEF        1     1      1          1      4   1       0001   0001  0001     01/17/97  Y
                                                          PRICE ZONES:  1= 1.19  2= 1.29  3= 1.39
Bar Code Type: 99      Random Wt. Type:  0    TARE ZONES:       1= 0.02  2= 0.03  3= 0.01
Effective Time: 0      Effective Date: 01-05-97
Blanked Outputs:                              GRADE ZONES:      1= 2  2= 3


0002 000001    STUFFED CORNISH               1     1      1          5      6   2       0002   0002  0003     01/17/97  N
               GAME HENS                            PRICE ZONES:  1= 2.99  2= 3.09  3= 3.19
Bar Code Type: 99      Random Wt. Type: 0     TARE ZONES:       1= 0.04  2= 0.03  3= 0.01
Effective Time: 0      Effective Date: 01-10-97
Blanked Outputs:                              GRADE ZONES:      1= 2  2= 3
--- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- ---
```

Print PLU File Listing With ET / With 5 Lines ET

These reports will print all of the department's PLU record fields with either the full extra text or with the first five lines of extra text assigned to the PLU's. The report can be sorted by PLU, Item number, or group. The report can be aborted at any time by pressing the **ESC** key. An example report, with full ET sorted by PLU, is as follows:

```
--- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- --- ---
01-17-97          METTLER TOLEDO PLU LISTING FOR DELI          PAGE 1
PLU#  ITEM#                                  PKG          CLASS/     SHELF EAT  ACTN    ET     NF    GRAPHIC  DATE OF
VENDOR#        DESCRIPTION                   COD   MOD    GROUP      LIFE   BY  CODE    CODE   CODE  CODE     CHANGE    SALE
-------------------------------------------------------------------------------------------------------------------------
000001 000001  MEAT BALLS PARMESAN           1     1      1          1      4   1       0001   0001  0002     01/17/97  Y
                                                          PRICE ZONES:  1= 1.19  2= 1.29  3= 1.39
Bar Code Type: 99      Random Wt. Type: 0     TARE ZONES:       1= 0.02  2= 0.03  3= 0.01
Effective Time: 0      Effective Date: 01-10-97
Blanked Outputs:                              GRADE ZONES:      1= 2  2= 3

        TEXT NUMBER:  10   LINES PER LABEL: 30   CHARACTERS PER LINE: 42
            INGREDIENTS:
            BEEF,WATER,PORK,CRACKER MEAL,CORN FLOUR,
            SOY FLOUR,SALT,ONION,CHILI PEPPER,LEVEN-
            ING,CELERY,BELL PEPPER,BLACK PEPPER, GAR-
            LIC AND CELERY SEED,GRATED PARMESAN CHEESE
            COOKING INSTRUCTIONS:
            CONVENTIONAL METHOD:
            BAKE MEATBALLS AT 350 DEGREES FOR 20 MIN.
            OR PAN FRY UNTIL CENTERS ARE NO LONGER
            PINK.
            MICROWAVE INSTRUCTIONS:
            MICROWAVE ON HIGH 5 TO 6 MINUTES, REARRANG-
            ING AFTER HALF OF COOKING TIME.


0002   000001  STUFFED CORNISH             1     1      1          5      6   0002    0003   0002  01/17/97  N
               GAME HENS                            PRICE ZONES:  1= 2.99  2= 3.09  3= 3.19
Bar Code Type: 99      Random Wt. Type: 0     TARE ZONES:       1= 0.04
Effective Time: 0      Effective Date: 01-10-97
Blanked Outputs:                              GRADE ZONES:      1= 2  2= 3

        TEXT NUMBER:  11   LINES PER LABEL: 30   CHARACTERS PER LINE: 42
```

INGREDIENTS:
CORNISH GAME HENS,BREAD CRUMBS,CRACKER MEAL,
CORN MEAL,SOY FLOUR,DEHYDRATED ONIONS,
CELERY,SPICES.

COOKING INSTRUCTIONS:
CONVENTIONAL METHOD:
BAKE AT 350 DEGREES FOR 40-45 MIN.
HENS ARE DONE WHEN TENDER AND JUICES
ARE CLEAR WHEN THIGH IS PIERCED WITH
A FORK.

MICROWAVE INSTRUCTIONS:
RUB ON BROWNING AGENT IF DESIRED AND
PLACE ON ROASTING RACK. COOK ON
HIGH 7-9 MIN PER POUND, TURNING AFTER
HALF OF COOKING TIME.

--- ---

Print Hourly Totals Report

Hourly totals reports are available on all scale types except type-2 8301C. If a department has one or more of these types of scales, the hourly total data will be summed into one set of hourly total data. When this function is selected, the totals data will be collected for all valid scales in the department, then the report will be printed. The program will also prompt you if you want to clear the hourly totals in the scale (Yes/No). An example report format is as follows:

01-17-1997 METTLER TOLEDO
10:42:33 HOURLY TOTAL REPORT
DEPARTMENT: 0-SERVICE MEAT STORE: 0001 PRICE ZONE: 01 TARE ZONE: 01

	WEIGHT	%	DOLLAR	%	COUNT
0- 1 AM	0.00	0.00	0.00	0.00	0
1- 2 AM	0.00	0.00	0.00	0.00	0
2- 3 AM	4.15	0.28	41.70	1.20	22
3- 4 AM	0.00	0.00	0.00	0.00	0
4- 5 AM	0.00	0.00	0.00	0.00	0
5- 6 AM	36.19	2.48	88.67	2.54	5
6- 7 AM	0.00	0.00	0.00	0.00	0
7- 8 AM	30.00	2.06	4.90	0.14	5
8- 9 AM	176.65	12.12	354.00	10.15	40
9-10 AM	5.46	0.37	16.00	0.46	5
10-11 AM	993.78	68.20	2463.68	70.66	108
11-12 AM	13.06	0.90	30.17	0.87	55
12- 1 PM	1.57	0.11	3.89	0.11	4
1- 2 PM	1.66	0.11	5.60	0.16	7
2- 3 PM	0.99	0.07	2.77	0.08	2
3- 4 PM	66.67	4.58	173.90	4.99	26
4- 5 PM	86.82	5.96	205.51	5.89	21
5- 6 PM	39.90	2.74	95.41	2.74	10
6- 7 PM	0.00	0.00	0.00	0.00	0
7- 8 PM	0.00	0.00	0.00	0.00	0
8- 9 PM	0.00	0.00	0.00	0.00	0
9-10 PM	0.29	0.02	0.61	0.02	1
10-11 PM	0.00	0.00	0.00	0.00	0

11-12 PM	0.00	0.00	0.00	0.00	0
	1457.19	100.00	3486.81	100.00	311

Print Zero Movement Report

The Zero Movement report lists PLU numbers that exist in the master file but do not have any production totals when the data is collected from the scales. This report is created by comparing the non-zero accumulator PLU's in the accumulator files with the PLU's in the master file. The net difference is the zero movement report. This report is useful for reporting slow selling merchandise. The report will list the PLU number, Item number, description, and price of each record. The report can be sorted by PLU number, Item number, or group. The program will prompt you for a production report prefix and store number. The report can be aborted at any time by pressing the **ESC** key.

Print Commodity Rack Listing

The commodity rack report is a listing of PLU numbers and descriptions for all PLU numbers in a department. This report can be used as a quick reference sheet by a scale operator to look up PLU numbers. The report can be sorted by PLU number, Item number, or group. The report can be aborted at any time by pressing the **ESC** key.

Print Price Book Listing

The Price Book is a flexible report that can be used as a look-up reference. You can select a single zone, or all zones, as well as supply a range of PLU numbers to print out. An example report showing all zones, and a single zone is shown below.

METTLER TOLEDO PRICE BOOK PLU LISTING FOR 0-SERVICE MEAT PAGE 1

PLU	ITEM	DESCRIPTION	ZONE PRICES
000001	0000001436	BEEF ROUND STEAK	1= 3.60 2= 3.65 3= 3.69 4= 3.70
000002	0000001300	BEEF ROUND STEAK THIN SLICED	1= 2.49 2= 2.59 3= 2.69 4= 2.79
000003	0000001443	BEEF ROUND STEAK BONELESS	1= 2.59 2= 2.69 3= 2.79 4= 2.89

METTLER TOLEDO PRICE BOOK PLU LISTING FOR 0-SERVICE MEAT PAGE 1

PLU	ITEM	DESCRIPTION	ZONE PRICES
000001	0000001436	BEEF ROUND STEAK	1= 3.60
000002	0000001300	BEEF ROUND STEAK THIN SLICED	1= 2.49
000003	0000001443	BEEF ROUND STEAK BONELESS	1= 2.59
000004	0000001801	BEEF ROUND STEAK CROSS CUT BONELESS	1= 3.49

Print On Sale PLU Price Book Listing

Same as price book listing but only for items on sale.

Print Future Activation File Listing
Prints a listing of the PLU's which are awaiting activation.

Display Current PLU/Production Data

Display PLU Data
Individual department PLU records can be viewed on the PC's monitor using the department function **Display Current PLU/Production Data**. All of the data fields including extra text assigned to the PLU can be displayed, as well as the production totals for the PLU record. All of the data fields will be displayed when the PLU number is entered, except the extra text and production totals. The PLU records can be viewed incrementally by pressing the **PAGE DOWN** key to advance to the next record, or using the **PAGE UP** key to back up to the previous record. An example screen showing PLU data is shown in Figure 4.6.20. If the PLU is on sale, it can be changed to "off sale" by pressing <**F4**>.

```
                          MAIN MENU              Mon 01-20-97 11:35:23
                  STORE=0001  BAUD=9600 COM=1  PRINTER=ON
                      DEPARTMENT FUNCTIONS MENU
            0-SERVICE MEAT  PRICE ZN=01  TARE ZN=01  GRADE ZN=01
                            DISPLAY PLU DATA
 Meat Balls Parmesan
 PLU Number:         1      Retail Price:  1.69     Shelf Life:      1
 Item Number: ....023456    Package Code:     0     Eat-By:          0
 Class/Group:        0      Modifier:         1     Action Number:   0
 Grade:              0      Tare:          0.02     Extra Text Code: 1
 Vendor #: ...........      Alt Tare:      0.04     Nutrition No:    2
 Bar Code Type:      0      Effective Time:   3     Graphics Code:   1
 Random Wt. Type     2      Eff. Date: 01-15-97     On Sale:
 Blanked Outputs:                                   Maint:    01-15-97

     TYPE           DOLLARS   WEIGHT   AVG.   DIFF.   COUNT   RUNS
    -------------------------------------------------------------
    Automatic:
    Manual:
    Rewrap:
    Combination:
    Inventory:
         TOTALS:
 F4=OffSale PgDn=Next PgUp=Prev F8=Tot F9=ET F5=TARE F6=PRICE f7=GRADE
```

Figure 4.6.20

Display PLU Data With Totals
Production totals can be viewed by pressing <**F8**>. The production totals can only be viewed if the department scales are on-line, since the scale totals are collected immediately when the <**F8**> key is pressed. The totals

information is valid only for the store that **Intelli-Net** is currently connected to. If totals for a remote store are needed, the remote store must first be manually dialed up (using the main menu function **Dial A Remote Store**) before using this function.

An example screen showing PLU data with production totals is shown in Figure 4.6.21.

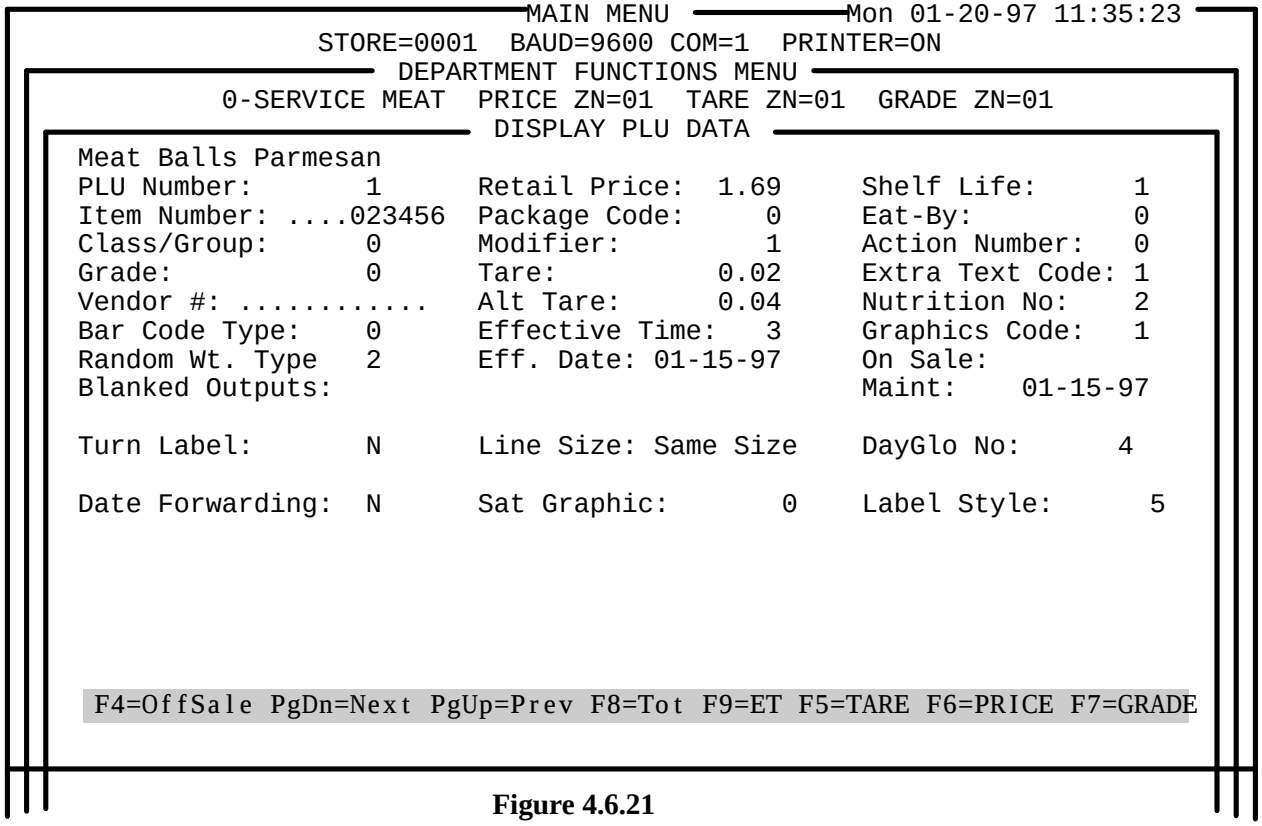


Figure 4.6.21

Display PLU Data With Extra Text

If an extra text record has been assigned to the PLU, it can be viewed by pressing **<F9>**. Figure 4.6.22 shows the PLU data displayed with extra text. When **<F9>** is pressed, a new window will open to display the extra text record linked to the PLU. Once the window is open, pressing **PageDown** will display the next extra text record in numerical order. **PageUp** will display the previous record. If the record is longer than the window, the entire text record can be viewed by using the cursor down (↓) key to scroll down in the text record, or the cursor up (↑) key to scroll up in the text record. Press **ESC** when you are finished viewing extra text.

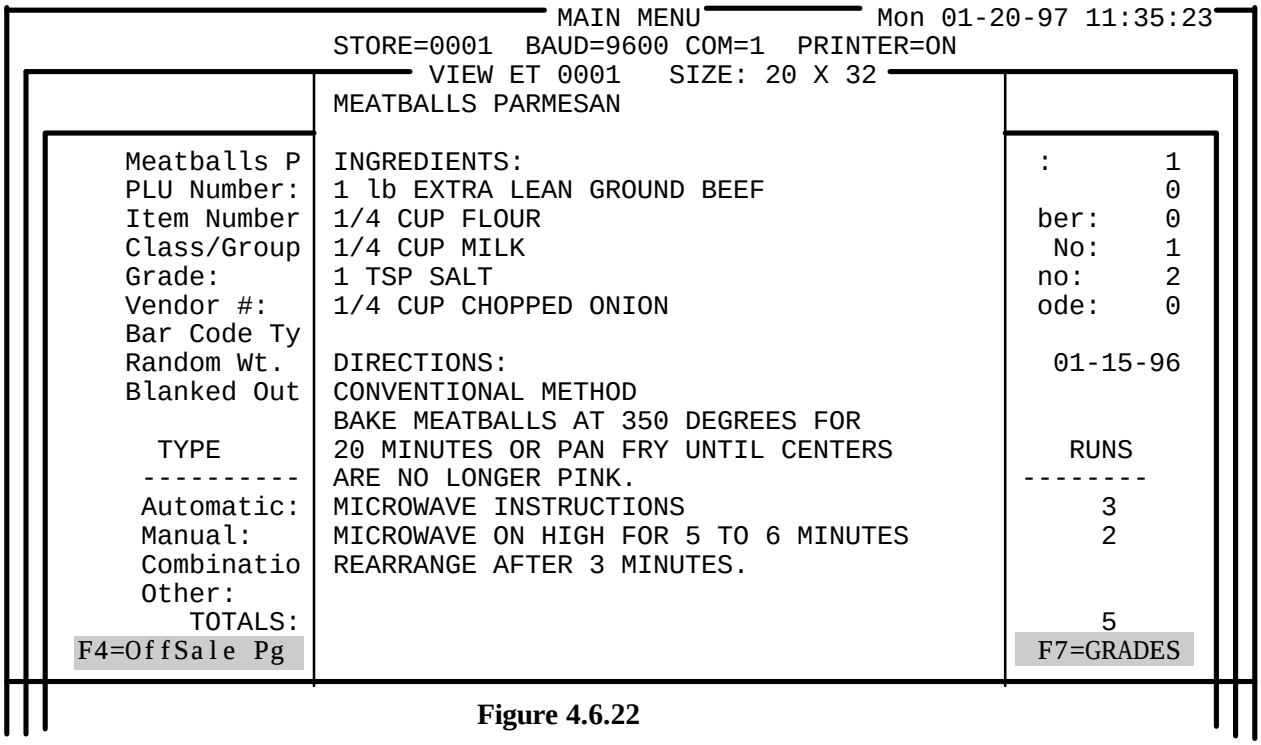


Figure 4.6.22

Display PLU Data with Nutrition Facts

If a nutrition fact record has been assigned to the PLU, it can be reviewed by pressing **<F10>**. When **<F10>** is pressed, a new window will open to display the nutrition fact record linked to the PLU. Once the window is open, pressing **Page Down** will display the remainder of the nutrition fact data. Press **ESC** when you are finished viewing the nutrition fact record.

Add Production Data To Department

When adding a new scale that may contain production totals to the **Intelli-Net** network, you may want to include the totals data with the existing **Intelli-Net** production totals. After configuring the new scale in the system, select **Department Functions** from the Main Menu, then select the department to add the scale totals into. Make sure the PC's line printer is on-line then select the department function **Add Production Data To Department**. Type in the scale address number, enter the production report prefix and press **Y** to clear the scale totals accumulators or **N** to not clear totals.

An example screen is shown in Figure 4.6.23.

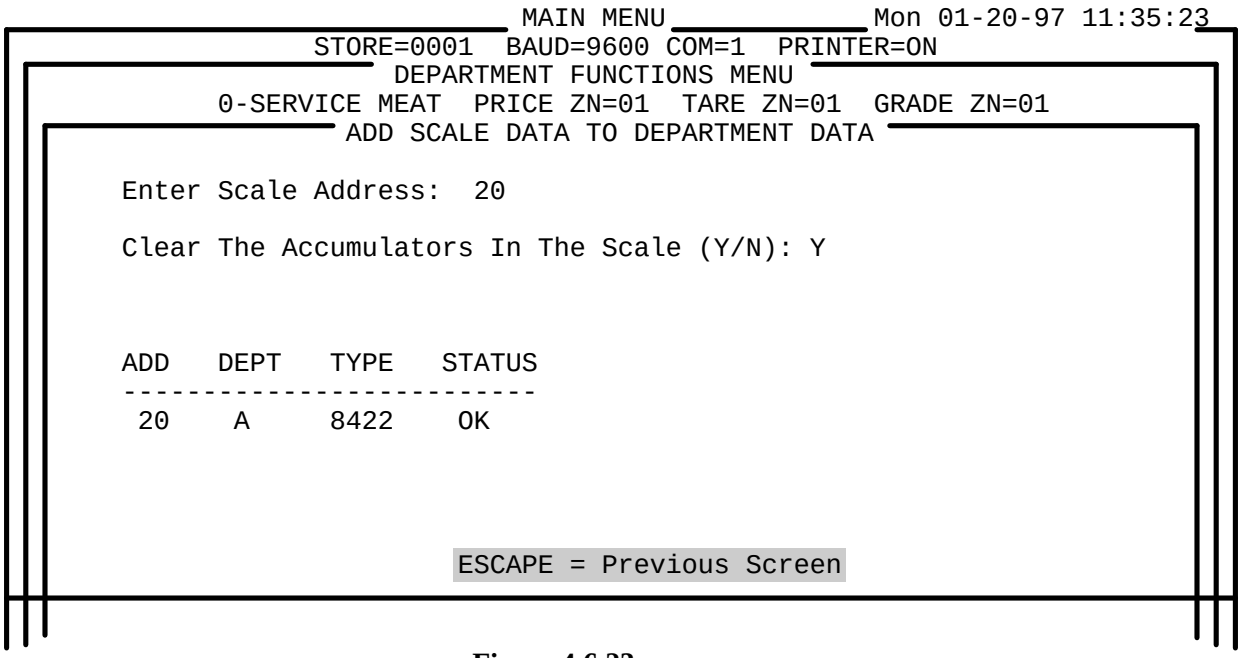


Figure 4.6.23

Erase all PLUs From Department

If no master password has been configured, anyone using the program can have access to the delete function.

This function will erase all of the current department's PLU records from the master PLU file. If a master password has been configured in **Intelli-Net**, the operator must be logged in with the master password in order to use this function. If a department is deleted in the Intelli-Net Configuration, the department PLU records will still exist in the master file. This function provides an easy way to erase an unused department's PLU file.

Change PLU Numbers

The PLU number is the number Intelli-Net uses to file each record. If the need arises to assign a record to a different number, first enter the old PLU number, then the new number you wish to use to call up the record. The new PLU number must be unique and not duplicated.

Set All On-Sale Flags to Off

This function allows the operator to change all PLU's marked on-sale to off-sale for this department.

Copy Zones

This function allows the operator to copy price or tare zones from one department to another.

Add an Existing PLU Directly to Scale

This function allows the sending of a single, already existing, PLU to a scale. You will be prompted for the address of the scale and the number for the PLU you wish to send down.

Check Availability of Scales

The main menu selection **Check Availability Of Scales** reports the status of all scales configured in the store to verify if they are ready to communicate with the PC. This function should be used prior to collecting data, sending records to the scales, or uploading records from the scales. This function is also helpful for troubleshooting system problems. **Intelli-Net** will report if a scale is **On-line**, **Off-line**, or **Busy**. **On-line** status indicates the scale is ready to communicate. **Off-line** indicates that no response was received from the scale. **Busy** indicates the scale is involved in a function and cannot immediately communicate with the PC. Conditions that could cause a scale not to be **On-line** are as follows:

- If the scale is an 8301C, 8423SA, or 8427SA, a weighing transaction may be in progress, or the scale has not returned to zero after a transaction. These scale types are not multi-tasking and must return to zero (idle mode) before they can communicate with a PC.
- The scale power switch was turned off.
- Internal scale malfunction.
- Network wiring/hardware problem.

When **Check Availability Of Scales** is selected, a status window will open that will show all of the scales configured for the current store. The status screen will show the scale address number, the department the scale is configured in, the scale type, and the status (On-line, Off-line, or Busy). If a scale does not immediately respond, **Intelli-Net** will attempt to communicate two more times. If this happens, the program will appear to momentarily pause. If the scale then does not respond to multiple tries, the next scale will be addressed, and **OFF LINE** will appear under the **STATUS** column. If the communication attempt was successful, **ON LINE** will be displayed under the **STATUS** column. If a scale is busy, **BUSY** will be displayed under the **STATUS** column.

When the last scale is completed, you will hear a "beep", and see a prompt to **PRESS ANY KEY**. After viewing the status of all scales in the store, you can press any key to return to the Main Menu. An example status screen

is shown in Figure 4.7.1. If the scale is a master type-4, 6, or 9 the same scale may be configured in multiple departments and will show up on the status screen in all of the departments configured in.

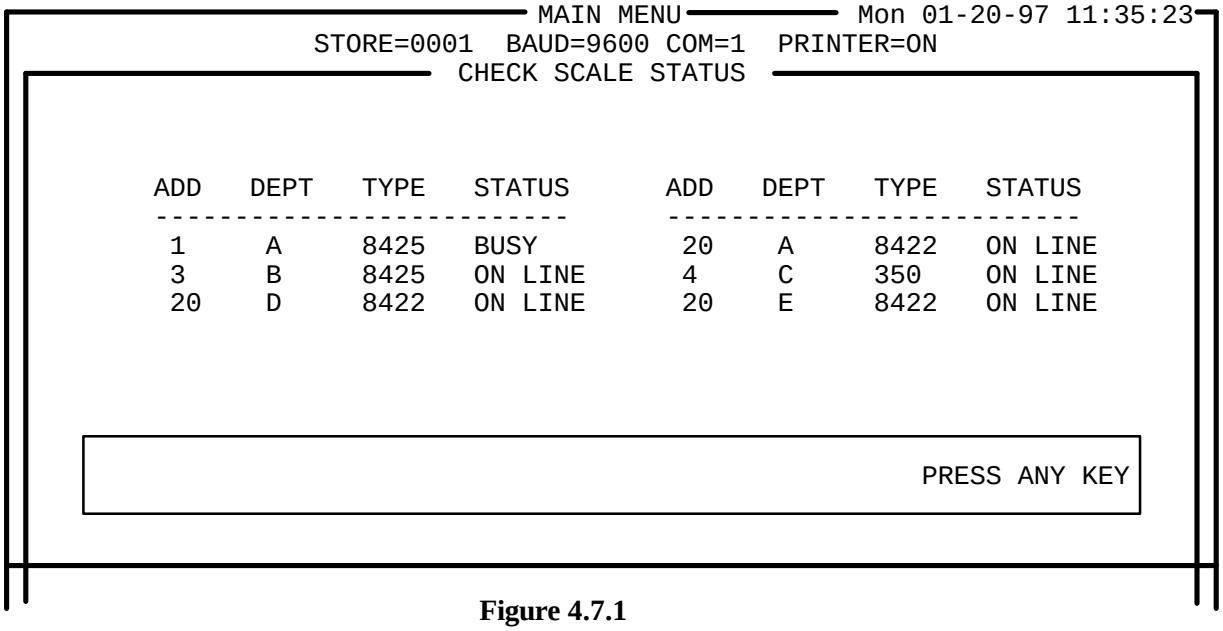


Figure 4.7.1

Copy Pending File to Scales

If you are initially building a new master file, no scales are initially required to post the pending file. This function will first update the master file, then attempt to communicate with the scale. If no scales are attached, Intelli-Net will generate an error message stating that scales are off-line. When the complete master file has been built, the Department Functions Menu selection Copy PLU File, or the main menu selection for type-4, type-6, or type-9 master scales Transfer All Files To Master Scales can be used.

Copy Pending File To Scales on the main menu is used to select pending files from different departments, and manually post the pending files to the scales and/or the respective **Intelli-Net** master file. This selection allows access to all pending files that have been created in all the various departments. The pending files can also be posted while in the individual Pending File Maintenance menus.

If you wish to manually post the pending file to a remote store, you must first dial the store using main menu selection **Dial A Remote Store** to first connect to the remote store via modem.

To post a pending file, use the following procedure:

STEP 1 - CHECK SCALE STATUS

Prior to posting a pending file, the scale(s) status should be checked by using main menu selection **Check Availability Of Scales** to verify the scale(s) are On-line and ready to communicate with the PC. If the scale is not On-line, the contents of the pending file will not be sent to the scale. Only the **Intelli-Net** master files will be updated.

Prior to asking for scale address, if you have selected a regular or sale pending file and have only 8460 type scales in this department for all stores configured, Intelli-Net will ask if you want to send all the records as future activation records. If you enter N (No), all records will be sent with the effective dates as entered with the PLU. If you enter Y (Yes), you will be asked to enter a new effective time and date. All records will be sent with the new effective time and date. This feature allows the user to send a pending file as a future activation file without having to edit each record in the pending file individually.

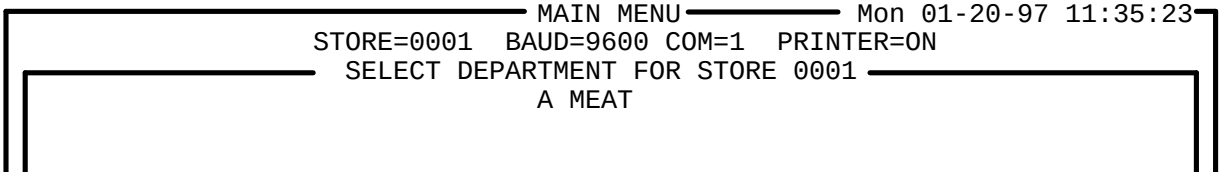
STEP 2 - SELECT DEPARTMENT

Next select main menu function **Copy Pending File To Scales**. You will first be asked to select a department. Select the department that contains the pending file you wish to post.

STEP 3 - SELECT PENDING FILE

For this example, we will use Department-A Meat. The **Select Pending File Menu** will then be displayed, as shown in Figure 4.8.1.

Next, select the pending file you wish to post by highlighting the pending file and pressing **ENTER**. After selecting the pending file, the program will prompt if you want to "Update Database?"(You will almost always enter “Y” to update the Intelli-Net Database. One case where you would answer “N” is when you would like to have limited promotional pricing at a new opening of a store, and do not want to update the Intelli-net database with the promotional pricing.) Now you can enter **ALL** to update all scales in the department, or the scale address number for the specific scale to update, as shown in Figure 4.8.2.



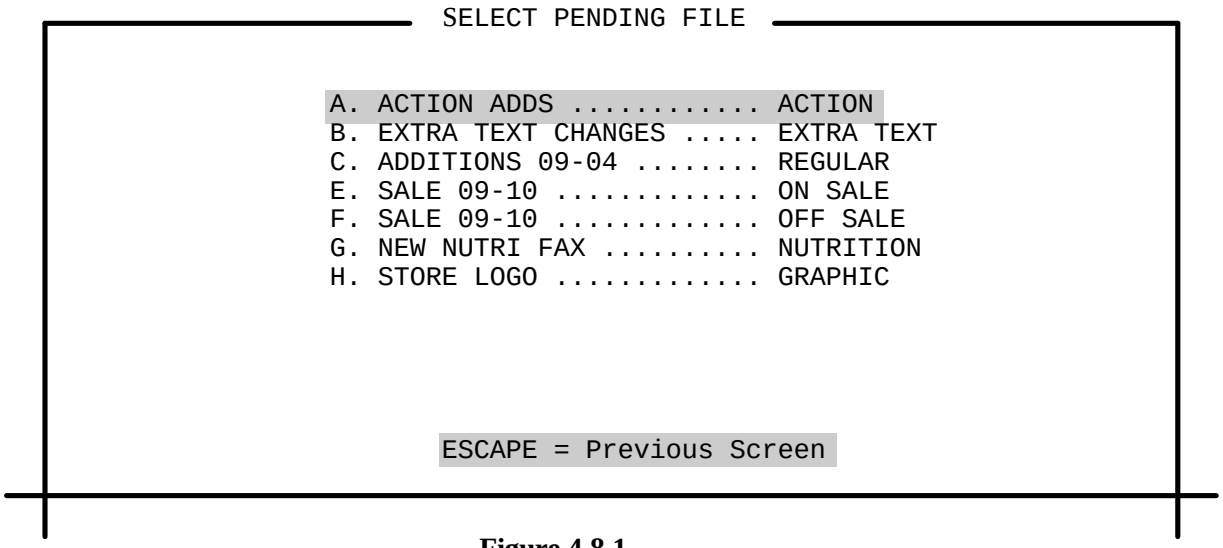
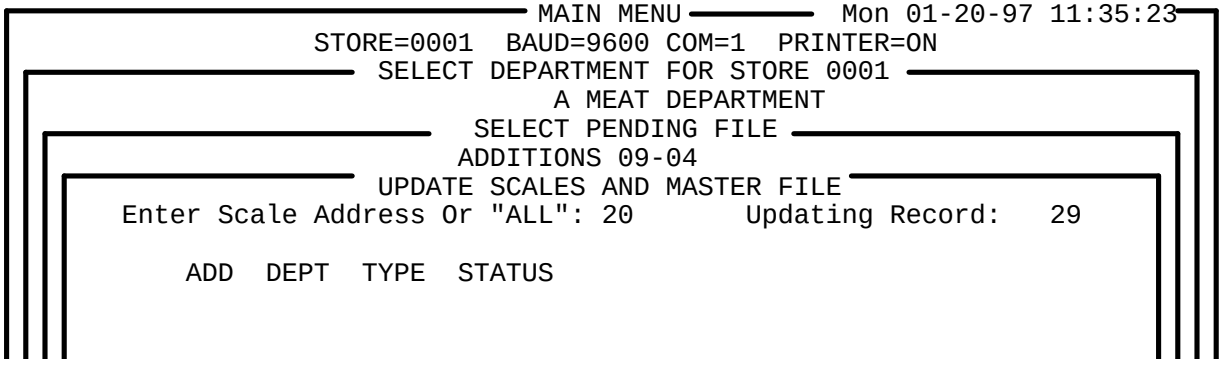


Figure 4.8.1

After typing in **ALL** (for all scales in the department) or a specific scale address number, the posting status will be displayed for the master file and for each scale selected. The record numbers will be displayed as they are posted to each scale, as shown in Figure 4.8.2.



```
-----------------------
20   A    8422  0200-ADD
```

```
  ESCAPE = Previous Screen
```

Figure 4.8.2

The **STATUS** column will display the record numbers sent to the scale, and the type of record: ADD = Addition, DEL = Delete Record, MOD = Modify Record. Any errors will be posted to the printer or status log. When the pending file has been copied, you can either select another pending file to post, or press **ESC** to return to the **Select Department** menu.

Miscellaneous Functions

The Miscellaneous Functions Menu allows access to various utility functions in Intelli-Net. The Miscellaneous Functions Menu is shown in Figure 4.9.1. On-line HELP is available for the various menu functions by highlighting the selection, then pressing the F1 function key. While in the sub-menus, help is available for most prompts and most sub-menu functions.

```
MAIN MENU                    Mon 01-20-97 11:35:23
          STORE=0001  BAUD=9600 COM=1  PRINTER=ON
          MISCELLANEOUS FUNCTIONS MENU

          Print/View Log File
          Create New Log File
          Import and Export Files
          Verify Scale Data For One Scale
          Backup/Restore Data Files
          Download Current Time To Scales
          Display Count of ET/PLU Records
          Rebuild Intelli-Net Database Indexes
          Change Default Directory
          Delete All Linked Records in the Scale
          Compress Memory in the Scale
          Copy PLUs From One Department to Another
```

```
                    ESCAPE = Previous Screen
```

Figure 4.9.1

Print/View Log File

The Print/View Log File function can be used to print or view the log file containing the history of previous unattended Autodial Sessions. This log can be used to verify all programmed stores were successfully contacted and the requested pending files were posted. Any malfunctions will be reported in the log. When the printer output has been turned off, all normal output will go to the file LOG.DAT and the menu description will only show "View Log File".

Create New Log File

This function is used to clear the current log file of any previous data. If you have toggled the printer status to OFF, all normally printed data will be sent to the file called LOG.DAT. You should use this function before sending reports to the log file to clear previous data sent to the log file. You should also periodically clear the log file, as this file can use a large amount of disk space and can slow down the performance of the computer system

Import/Export Files

The Import function allows an ASCII text file created with another program to be imported (converted) into an Intelli-Net file. The Export function will convert an Intelli-Net binary file to a Delimited text file.The file format for the Import/Export is a Delimited ASCII text file. Character fields (i.e. vendor number, description, etc.) are delimited with double quotes and commas, with trailing blanks truncated. Numeric fields are seperated by commas with leading zeros truncated. Logical fields are ‘1’ = True, ‘0’ = False. The extension for these files is ”.TXT”. The Import/Export Menu is shown in Figure 4.9.2.

```
                     MAIN MENU            Mon 01-20-97 11:35:23
            STORE=0001  BAUD=9600 COM=1  PRINTER=ON
                 MISCELLANEOUS FUNCTIONS MENU

                 IMPORT AND EXPORT FILES MENU


          Export Reports
          Import/Export Pending File
          Import/Export Extra Text File
          Import/Export Action Code File
          Import/Export Item File
```

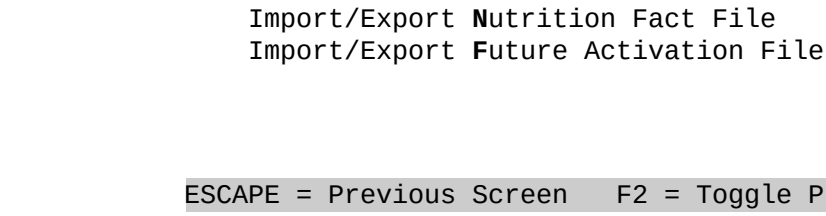

Import/Export Nutrition Fact File
Import/Export Future Activation File
ESCAPE = Previous Screen F2 = Toggle Printer Status

Figure 4.9.2

Convert reports to Delimited Text Files

The fields are shown below in the order they will appear in the record.

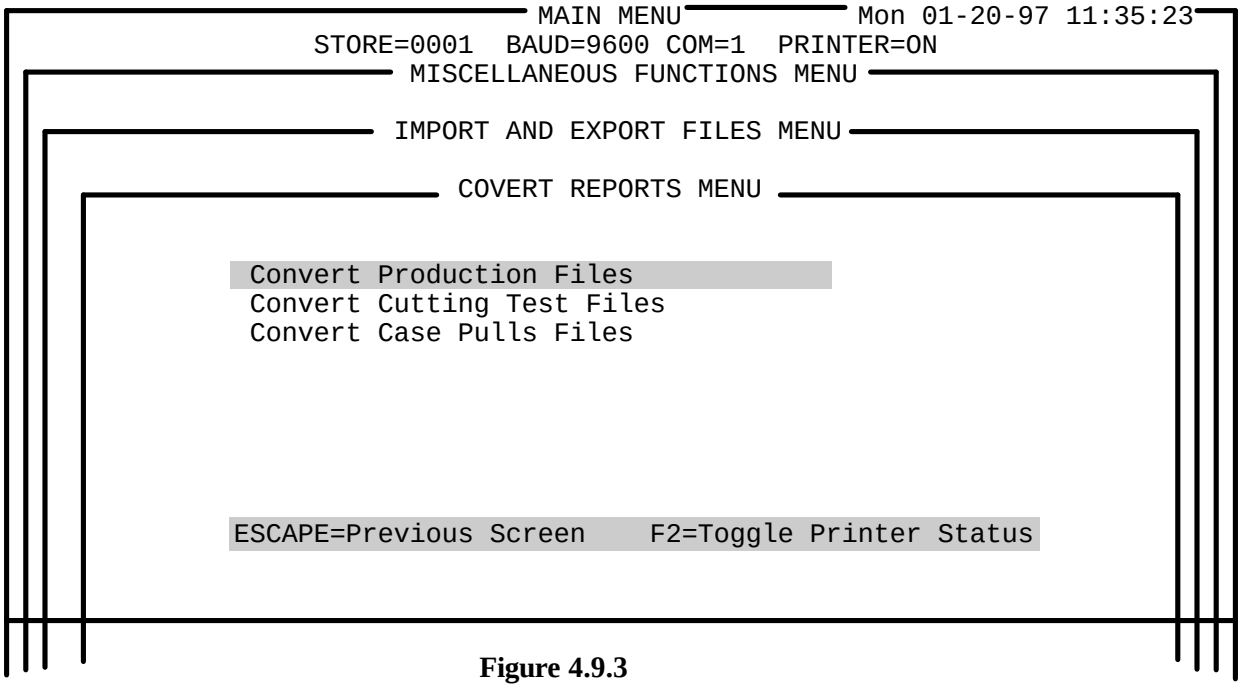


Figure 4.9.3

- **Case Pulls Output File Format**

MAX LENGTH	DESCRIPTION
10	item number
8	total value
6	total count

The internal database of Intelli-Net is always setup for 6 digit PLUs and 10 digit Item numbers. When using a 4 digit PLU scale, the two most significant digits for PLUs will be always be 0 and the four most significant digits for Item numbers will always be 0 respectively.

- **Cutting Test Output File Format**

LENGTH	DESCRIPTION
1	record type
	*** TYPE 0 PLU ***
6	product number
7	price per pound
8	product weight
8	product cost
5	start time
8	start date
5	end time
8	end date
	*** TYPE 1 PLU ***
1	department number
6	PLU number
8	total weight
8	total value

6 total packages

- **Production Output File Format**

MAX LENGTH	DESCRIPTION
1	department number
4	store number
6	PLU number
10	item number
1	sale item flag
3	class/group
7	retail price
3	modifier
2	package code
7	cost
2	grade
3	shelf life
5	tare
5	alt_tare
3	eat by
6	extra_text
6	nutrition number
6	graphics
2	action_code
64	description
16	maint date
8	effective date
2	effective hour
2	barcode type
1	weight type
1	blank shelf life (0=not blanked,1=blanked)
1	blank eat by (0=not blanked,1=blanked)
1	blank pack date (0=not blanked,1=blanked)

MAX LENGTH	DESCRIPTION
1	blank weight (0=not blanked,1=blanked)
1	blank unit price (0=not blanked,1=blanked)
1	blank total price (0=not blanked,1=blanked)
8	total count(1)
8	total count(2)
8	total count(3)
8	total count(4)
8	total count(5)
9	total weight(1)
9	total weight(2)
9	total weight(3)
9	total weight(4)
9	total weight(5)
9	total value(1)
9	total value(2)
9	total value(3)
9	total value(4)
9	total value(5)
5	total runs(1)
5	total runs(2)
5	total runs(3)
5	total runs(4)
5	total runs(5)

Notes For Pending File Format

- All numeric fields must be zero filled.
- **Retail price** consists of 99 different zones. Forced price can be coded using -999.
- **Tare**, **Alternate Tares**, and **Grades** consist of 10 different zones. Forced tares can be coded in using **-999.**
- The **Pending File Name** field must be left justified.

Data Checks On Import File

- **Department Number** must be configured in **Intelli-Net** prior to importing the pending file.
- **Record Type** must be one of the following: **W** = Modify All Data, **X** = Price Only Change, **Y** = Delete Record, or **Z** = Add Record.
- **PLU Number** must be up to six digits numeric.
- **File Type** must be one of the following: **PS** = sale pending file, **PR** = regular pending file, **ET** = extra text pending file, **AC** = action pending file, **NF** = nutrition fact file, and **GG** = graphics file.
- **Pending File Name** field cannot be all spaces. If the **File Type** is **S**, then the **Pending File Name** cannot be greater than 12 characters.
- If the **Maintenance Date** field is blank (all spaces), the current date will be used for the maintenance date field.

Checks Made On Records with file type of PR, PX, or PS

- The **Item Number** field must be numeric.
- The **Group Number** field must be numeric.
- The **Retail Prices** field must be numeric.
- The **Package Code** field must be numeric and zero padded and have a value of less than 5.
- The **Modifier** field must be numeric and zero padded. If the **Package Code** is a **2**, then the modifier must be either a **2** or **4**. Otherwise, the modifier can be a value between 1 and 999.
- **Cost** must be numeric.
- The **Grade** must be numeric and must be a value between 0 and 15.

- **Shelf Life** must be numeric with a value between 0 and 999.
- **Tare** must be numeric.
- **Eat By** must be numeric and must be a value between 0 and 999.
- **Extra Text Code** must be numeric.
- **Action Code** must be numeric and must be a value between 0 and 50.

Import/Export a DELIMITED text file

The file format for Import/Export is a DELIMITED text file. Character fields (i.e. vendor number, description, etc.) are delimited with double quotes and commas, with trailing blanks truncated. Numeric fields are seperated by commas with leading zeros truncated. Logical fields are '1'=True, '0'= false.. The fields are shown below in the order they will appear in the record. If more than one file is created a "1" is appended to the file name.

IMPORT/EXPORT PENDING FILE

PENDING FILE 1

Field	Description	Type	Max Length	Valid Characters	Range
1	File type	Char	2	PR,PX,PS,ET,NF,AC, GG	
2	Record Type	Char	1	X,W,Y,Z	
3	Department	Char	1	ABCDEFGHIJKLMNO	
4	Plu Number	Num	6	0123456789	1-999999
5	Pending Name	Char	16	Alphanumeric	
6	Maint. Date	Char	16		MM-DD-YYHH:MM:SS

REMAINDER OF PENDING FILE 1 IF FILE TYPE IS AC

Field	Description	Type	Max Length	Valid Characters	Range
7	Action Number	Num	1	0123456789	1-50
8	Action Type	Num	1	0123456789	1-3
9	Action Description	Char	64	Alphanumeric	

REMAINDER OF PENDING FILE 1 IF FILE TYPE IS PR, PS, OR PX

Field	Description	Type	Max Length	Valid Characters	Range
7	Vendor	Char	10	Alphanumeric	
8	Item Number	Num	10	0123456789	0-999999999
9	Class/Group	Num	3	0123456789	0-999
10	Modifier	Num	3	0123456789	0-999
11	Package Code	Num	1	01234	0-4
12	Cost	Num	7	.0123456789	0-999999
13	Grade[zone 1]	Num	2	0123456789	0-15
14	Grade[zone 2]	Num	2	0123456789	0-15
15	Grade[zone 3]	Num	2	0123456789	0-15
16	Grade[zone 4]	Num	2	0123456789	0-15
17	Grade[zone 5]	Num	2	0123456789	0-15
18	Grade[zone 6]	Num	2	0123456789	0-15
19	Grade[zone 7]	Num	2	0123456789	0-15
20	Grade[zone 8]	Num	2	0123456789	0-15
21	Grade[zone 9]	Num	2	0123456789	0-15
22	Grade[zone 10]	Num	2	0123456789	0-15
23	Shelf Life	Num	3	0123456789	0-999
24	Tare[zone 1]	Num	4	.0123456789	0-9999
25	Tare[zone 2]	Num	4	.0123456789	0-9999
26	Tare[zone 3]	Num	4	.0123456789	0-9999
27	Tare[zone 4]	Num	4	.0123456789	0-9999
28	Tare[zone 5]	Num	4	.0123456789	0-9999
29	Tare[zone 6]	Num	4	.0123456789	0-9999
30	Tare[zone 7]	Num	4	.0123456789	0-9999
31	Tare[zone 8]	Num	4	.0123456789	0-9999
32	Tare[zone 9]	Num	4	.0123456789	0-9999
33	Tare[zone 10]	Num	4	.0123456789	0-9999
34	Extra Text Number	Num	6	0123456789	0-999999
35	Action Code	Num	2	0123456789	0-50
36	Eat by	Num	3	0123456789	0-999
37	Nutrition Number	Num	6	0123456789	0-999999
38	Graphics Number	Num	6	0123456789	0-999999
39	Effective Date	Char	8	-0123456789	mm-dd-yy
40	Effective Hour	Num	2	0123456789	0-23
41	Bar Code Type	Num	2	0123456789	0,2-5,99
42	Weight Type	Num	1	0123456789	0-7
43	Blanked Shelf Life	Boolean	1	01	
44	Blanked Eat By	Boolean	1	01	
45	Blanked Pack Date	Boolean	1	01	
46	Blanked Weight	Boolean	1	01	
47	Blanked Unit Price	Boolean	1	01	
48	Blanked Total Price	Boolean	1	01	
49	Alt Tare[zone 1]	Num	4	.0123456789	0-9999
50	Alt Tare[zone 2]	Num	4	.0123456789	0-9999
51	Alt Tare[zone 3]	Num	4	.0123456789	0-9999
52	Alt Tare[zone 4]	Num	4	.0123456789	0-9999

53	Alt Tare[zone 5]	Num	4	.0123456789	0-9999
54	Alt Tare[zone 6]	Num	4	.0123456789	0-9999
55	Alt Tare[zone 7]	Num	4	.0123456789	0-9999
56	Alt Tare[zone 8]	Num	4	.0123456789	0-9999
57	Alt Tare[zone 9]	Num	4	.0123456789	0-9999
58	Alt Tare[zone 10]	Num	4	.0123456789	0-9999
59	Description Line 1	Char	32	alphanumeric	
60	Description Line 2	Char	32	alphanumeric	
61	Day Glow Number	Num	6	0123456789	0-999999
62	Proportional Alt Tare	Boolean	1	01	
63	Turn Label	Boolean	1	01	
64	Date Forwarding	Boolean	1	01	
65	Line 2 size	Num	1	01234567	0-7
66	Sat. Graphic	Num	2	0123456789	0-15
67	Label Style	Num	1	01234567	0-7

PENDING FILE 2 (PRICING)

Field	Description	Type	Max Length	Valid Characters	Range
1	File type	Char	2	PR,PX,PS,ET,NF,AC, GG	
2	Record Type	Char	1	X,W,Y,Z	
3	Department	Char	1	ABCDEFGHIJKLMNO	
4	Plu Number	Num	6	0123456789	1-999999
5	Pending Name	Char	16	Alphanumeric	
6	Maint. Date	Char	16		MM-DD-YYHH:MM:SS
7	Price [Zone 1]	Num	7	.0123456789	0-999999
8	Price [Zone2]	Num	7	.0123456789	0-999999
9	Price [Zone 3]	Num	7	.0123456789	0-999999
10	Price [Zone 4]	Num	7	.0123456789	0-999999
11	Price [Zone 5]	Num	7	.0123456789	0-999999
12	Price [Zone 6]	Num	7	.0123456789	0-999999
13	Price [Zone 7]	Num	7	.0123456789	0-999999
14	Price [Zone 8]	Num	7	.0123456789	0-999999
15	Price [Zone 9]	Num	7	.0123456789	0-999999
16	Price [Zone 10]	Num	7	.0123456789	0-999999
17	Price [Zone 11]	Num	7	.0123456789	0-999999
18	Price [Zone 12]	Num	7	.0123456789	0-999999
19	Price [Zone 13]	Num	7	.0123456789	0-999999
20	Price [Zone 14]	Num	7	.0123456789	0-999999
21	Price [Zone 15]	Num	7	.0123456789	0-999999
22	Price [Zone 16]	Num	7	.0123456789	0-999999
23	Price [Zone 17]	Num	7	.0123456789	0-999999
24	Price [Zone 18]	Num	7	.0123456789	0-999999
25	Price [Zone 19]	Num	7	.0123456789	0-999999

26	Price [Zone 20]	Num	7	.0123456789	0-999999
27	Price [Zone 21]	Num	7	.0123456789	0-999999
28	Price [Zone 22]	Num	7	.0123456789	0-999999
29	Price [Zone 23]	Num	7	.0123456789	0-999999
30	Price [Zone 24]	Num	7	.0123456789	0-999999
31	Price [Zone 25]	Num	7	.0123456789	0-999999
32	Price [Zone 26]	Num	7	.0123456789	0-999999
33	Price [Zone 27]	Num	7	.0123456789	0-999999
34	Price [Zone 28]	Num	7	.0123456789	0-999999
35	Price [Zone 29]	Num	7	.0123456789	0-999999
36	Price [Zone 30]	Num	7	.0123456789	0-999999
37	Price [Zone 31]	Num	7	.0123456789	0-999999
38	Price [Zone 32]	Num	7	.0123456789	0-999999
39	Price [Zone 33]	Num	7	.0123456789	0-999999
40	Price [Zone 34]	Num	7	.0123456789	0-999999
41	Price [Zone 35]	Num	7	.0123456789	0-999999
42	Price [Zone 36]	Num	7	.0123456789	0-999999
43	Price [Zone 37]	Num	7	.0123456789	0-999999
44	Price [Zone 38]	Num	7	.0123456789	0-999999
45	Price [Zone 39]	Num	7	.0123456789	0-999999
46	Price [Zone 40]	Num	7	.0123456789	0-999999
47	Price [Zone 41]	Num	7	.0123456789	0-999999
48	Price [Zone 42]	Num	7	.0123456789	0-999999
49	Price [Zone 43]	Num	7	.0123456789	0-999999
50	Price [Zone 44]	Num	7	.0123456789	0-999999
51	Price [Zone 45]	Num	7	.0123456789	0-999999
52	Price [Zone 46]	Num	7	.0123456789	0-999999
53	Price [Zone 47]	Num	7	.0123456789	0-999999
54	Price [Zone 48]	Num	7	.0123456789	0-999999
55	Price [Zone 49]	Num	7	.0123456789	0-999999
56	Price [Zone 50]	Num	7	.0123456789	0-999999
57	Price [Zone 51]	Num	7	.0123456789	0-999999
58	Price [Zone 52]	Num	7	.0123456789	0-999999
59	Price [Zone 53]	Num	7	.0123456789	0-999999
60	Price [Zone 54]	Num	7	.0123456789	0-999999
61	Price [Zone 55]	Num	7	.0123456789	0-999999
62	Price [Zone 56]	Num	7	.0123456789	0-999999
63	Price [Zone 57]	Num	7	.0123456789	0-999999
64	Price [Zone 58]	Num	7	.0123456789	0-999999
65	Price [Zone 59]	Num	7	.0123456789	0-999999
66	Price [Zone 60]	Num	7	.0123456789	0-999999
67	Price [Zone 61]	Num	7	.0123456789	0-999999
68	Price [Zone 62]	Num	7	.0123456789	0-999999
69	Price [Zone 63]	Num	7	.0123456789	0-999999
70	Price [Zone 64]	Num	7	.0123456789	0-999999
71	Price [Zone 65]	Num	7	.0123456789	0-999999
72	Price [Zone 66]	Num	7	.0123456789	0-999999
73	Price [Zone 67]	Num	7	.0123456789	0-999999
74	Price [Zone 68]	Num	7	.0123456789	0-999999
75	Price [Zone 69]	Num	7	.0123456789	0-999999

76	Price [Zone 70]	Num	7	.0123456789	0-999999
77	Price [Zone 71]	Num	7	.0123456789	0-999999
78	Price [Zone 72]	Num	7	.0123456789	0-999999
79	Price [Zone 73]	Num	7	.0123456789	0-999999
80	Price [Zone 74]	Num	7	.0123456789	0-999999
81	Price [Zone 75]	Num	7	.0123456789	0-999999
82	Price [Zone 76]	Num	7	.0123456789	0-999999
83	Price [Zone 77]	Num	7	.0123456789	0-999999
84	Price [Zone 78]	Num	7	.0123456789	0-999999
85	Price [Zone 79]	Num	7	.0123456789	0-999999
86	Price [Zone 80]	Num	7	.0123456789	0-999999
87	Price [Zone 81]	Num	7	.0123456789	0-999999
88	Price [Zone 82]	Num	7	.0123456789	0-999999
89	Price [Zone 83]	Num	7	.0123456789	0-999999
90	Price [Zone 84]	Num	7	.0123456789	0-999999
91	Price [Zone 85]	Num	7	.0123456789	0-999999
92	Price [Zone 86]	Num	7	.0123456789	0-999999
93	Price [Zone 87]	Num	7	.0123456789	0-999999
94	Price [Zone 88]	Num	7	.0123456789	0-999999
95	Price [Zone 89]	Num	7	.0123456789	0-999999
96	Price [Zone 90]	Num	7	.0123456789	0-999999
97	Price [Zone 91]	Num	7	.0123456789	0-999999
98	Price [Zone 92]	Num	7	.0123456789	0-999999
99	Price [Zone 93]	Num	7	.0123456789	0-999999
100	Price [Zone 94]	Num	7	.0123456789	0-999999
101	Price [Zone 95]	Num	7	.0123456789	0-999999
102	Price [Zone 96]	Num	7	.0123456789	0-999999
103	Price [Zone 97]	Num	7	.0123456789	0-999999
104	Price [Zone 98]	Num	7	.0123456789	0-999999
105	Price [Zone 99]	Num	7	.0123456789	0-999999

REMAINDER OF PENDING FILE 1 IF FILE TYPE IS GG

Field	Description	Type	Max Length	Valid Characters	Range
7	Graphics Number	Num	6	0123456789	1-999999

REMAINDER OF PENDING FILE 1 IF FILE TYPE IS NF

Field	Description	Type	Max Length	Valid Characters	Range
7	Nutrition Number	Num	6	0123456789	1-999999
8	Label Format	Num	1	01	0=one label 1=two labels
9	Label Order	Num	1	01	0=Plu/NF 1=NF/Plu
10	Batch Mode	Num	1	01	0=alternate

					1=group
11	Template	Num	1	0123	0=vertical 1=tabular 2=lin.landscap 3=lin. portrait
12	Data	Num	1	01	0=standard 1=simplified
13	Serving Units	Num	1	012	0=ounces 1=pieces 2=text
14	Serving Size Text	Char	28	Alphanumeric	
15	Serving Size	Num	4	0123456789	
16	Serving Size g.	Char	6	Alphanumeric	
17	Calories	Num	4	0123456789	
18	Calories fat	Num	4	0123456789	
19	Calories sat fat	Num	4	0123456789	
20	Servings per container	Char	10	Alphanumeric	
21	Total Fat (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
22	Total Fat (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
23	Saturated Fat (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
24	Saturated Fat (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
25	Polyunsaturated Fat (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
26	Monounsaturated Fat (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
27	cholesterol (mg)	Char	6	0123456789mg	1st four chars are num followed by ‘mg‘
28	cholesterol (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
29	sodium (mg)	Char	6	0123456789mg	1st four chars are num followed by ‘mg‘
30	sodium (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
31	potassium (mg)	Char	6	0123456789mg	1st four chars are num followed by ‘mg‘

32	potassium (%)	Char	6	0123456789%	1st four chars are num followed by '% '
33	Total Carbohydrate (g)	Char	6	0123456789g	1st four chars are num followed by 'g '
34	Total Carbohydrate (%)	Char	6	0123456789%	1st four chars are num followed by '% '
35	Dietary Fiber (g)	Char	6	0123456789g	1st four chars are num followed by 'g '
36	Dietary Fiber (%)	Char	6	0123456789%	1st four chars are num followed by '% '
37	Soluble Fiber (g)	Char	6	0123456789g	1st four chars are num followed by 'g '
38	insoluble fiber (g)	Char	6	0123456789g	1st four chars are num followed by 'g '
39	sugar (g)	Char	6	0123456789g	1st four chars are num followed by 'g '
40	sugar alcohol (g)	Char	6	0123456789g	1st four chars are num followed by 'g '
41	other carbohydrate (g)	Char	6	0123456789g	1st four chars are num followed by 'g '
42	protein (g)	Char	6	0123456789g	1st four chars are num followed by 'g '
43	protein (%)	Char	6	0123456789%	1st four chars are num followed by '% '
44	vitamin a (%)	Char	6	0123456789%	1st four chars are num followed by '% '
45	beta-carotene (%)	Char	6	0123456789%	1st four chars are num followed by '% '
46	vitamin c (%)	Char	6	0123456789%	1st four chars are num followed by '% '
47	calcium (%)	Char	6	0123456789%	1st four chars are num followed by '% '
48	iron (%)	Char	6	0123456789%	1st four chars are num followed by '% '
49	vitamin d (%)	Char	6	0123456789%	1st four chars are num followed by '% '
50	vitamin e (%)	Char	6	0123456789%	1st four chars are num followed by '% '
51	thiamin (%)	Char	6	0123456789%	1st four chars are num followed by '% '

52	riboflavin (%)	Char	6	0123456789%	1st four chars are num followed by '% '
53	niacin (%)	Char	6	0123456789%	1st four chars are num followed by '% '
54	vitamin b6 (%)	Char	6	0123456789%	1st four chars are num followed by '% '
55	folate (%)	Char	6	0123456789%	1st four chars are num followed by '% '
56	vitamin b12 (%)	Char	6	0123456789%	1st four chars are num followed by '% '
57	biotin (%)	Char	6	0123456789%	1st four chars are num followed by '% '
58	pantothenic acid (%)	Char	6	0123456789%	1st four chars are num followed by '% '
59	phosphorus (%)	Char	6	0123456789%	1st four chars are num followed by '% '
60	iodine (%)	Char	6	0123456789%	1st four chars are num followed by '% '
61	Magnesium (%)	Char	6	0123456789%	1st four chars are num followed by '% '
62	zinc (%)	Char	6	0123456789%	1st four chars are num followed by '% '
63	copper (%)	Char	6	0123456789%	1st four chars are num followed by '% '
64	spare1	Char	6	alphanumeric	
65	spare2	Char	6	alphanumeric	
66	spare3	Char	6	alphanumeric	
67	spare4	Char	6	alphanumeric	
68	spare5	Char	6	alphanumeric	
69	spare6	Char	6	alphanumeric	
70	spare7	Char	6	alphanumeric	
71	spare8	Char	6	alphanumeric	

REMAINDER OF PENDING FILE 1 IF FILE TYPE IS ET

Field	Description	Type	Max Length	Valid Characters	Range

7	Record Type	Char	1	SRH	
8	Extra text number	Num	6	0123456789	1-999999
9	Lines per label	Num	2	0123456789	
10	Characters per line	Num	2	0123456789	
11	line #	Num	2	0123456789	
12	Extra text data	Char	54	Alphanumeric	

IMPORT/EXPORT EXTRA TEXT FILE

Extra Text file

Field	Description	Type	Max Length	Valid Characters	Range
1	Record Type	Char	1	SRH	
2	Extra text number	Num	6	0123456789	1-999999
3	Lines per label	Num	2	0123456789	
4	Characters per line	Num	2	0123456789	
5	line #	Num	2	0123456789	
6	Extra text data	Char	54	Alphanumeric	

IMPORT/EXPORT ACTION CODE FILE

Action Code Text File

Field	Description	Type	Max Length	Valid Characters	Range
1	Action Number	Num	1	0123456789	1-50
2	Action Type	Num	1	0123456789	1-3
3	Action Description	Char	64	Alphanumeric	

IMPORT/EXPORT ITEM FILE

ITEM TEXT FILE 1

Field	Description	Type	Max Length	Valid Characters	Range
1	Department	Char	1	ABCDEFGHIJKLMNO	
2	Plu Number	Num	6	0123456789	1-999999
3	Vendor	Char	10	Alphanumeric	
4	Item Number	Num	10	0123456789	0-9999999999
5	Sale Flag	Boolean	1	01	
6	Class/Group	Num	3	0123456789	0-999
7	Modifier	Num	3	0123456789	0-999
8	Package Code	Num	1	01234	0-4
9	Cost	Num	7	.0123456789	0-999999
10	Grade[zone 1]	Num	2	0123456789	0-15
11	Grade[zone 2]	Num	2	0123456789	0-15
12	Grade[zone 3]	Num	2	0123456789	0-15
13	Grade[zone 4]	Num	2	0123456789	0-15
14	Grade[zone 5]	Num	2	0123456789	0-15
15	Grade[zone 6]	Num	2	0123456789	0-15
16	Grade[zone 7]	Num	2	0123456789	0-15

17	Grade[zone 8]	Num	2	0123456789	0-15
18	Grade[zone 9]	Num	2	0123456789	0-15
19	Grade[zone 10]	Num	2	0123456789	0-15
20	Shelf Life	Num	3	0123456789	0-999
21	Tare[zone 1]	Num	4	.0123456789	0-9999
22	Tare[zone 2]	Num	4	.0123456789	0-9999
23	Tare[zone 3]	Num	4	.0123456789	0-9999
24	Tare[zone 4]	Num	4	.0123456789	0-9999
25	Tare[zone 5]	Num	4	.0123456789	0-9999
26	Tare[zone 6]	Num	4	.0123456789	0-9999
27	Tare[zone 7]	Num	4	.0123456789	0-9999
28	Tare[zone 8]	Num	4	.0123456789	0-9999
29	Tare[zone 9]	Num	4	.0123456789	0-9999
30	Tare[zone 10]	Num	4	.0123456789	0-9999
31	Eat by	Num	3	0123456789	0-999
32	Extra Text Number	Num	6	0123456789	0-999999
33	Action Code	Num	2	0123456789	0-50
34	Nutrition Number	Num	6	0123456789	0-999999
35	Graphics Number	Num	6	0123456789	0-999999
36	Effective Date	Char	8	-0123456789	mm-dd-yy
37	Effective Hour	Num	2	0123456789	0-23
38	Bar Code Type	Num	2	0123456789	0,2-5,99
39	Weight Type	Num	1	0123456789	0-7
40	Blanked Shelf Life	Boolean	1	01	
41	Blanked Eat By	Boolean	1	01	
42	Blanked Pack Date	Boolean	1	01	
43	Blanked Weight	Boolean	1	01	
44	Blanked Unit Price	Boolean	1	01	
45	Blanked Total Price	Boolean	1	01	
46	Alt Tare[zone 1]	Num	4	.0123456789	0-9999
47	Alt Tare[zone 2]	Num	4	.0123456789	0-9999
48	Alt Tare[zone 3]	Num	4	.0123456789	0-9999
49	Alt Tare[zone 4]	Num	4	.0123456789	0-9999
50	Alt Tare[zone 5]	Num	4	.0123456789	0-9999
51	Alt Tare[zone 6]	Num	4	.0123456789	0-9999
52	Alt Tare[zone 7]	Num	4	.0123456789	0-9999
53	Alt Tare[zone 8]	Num	4	.0123456789	0-9999
54	Alt Tare[zone 9]	Num	4	.0123456789	0-9999
55	Alt Tare[zone 10]	Num	4	.0123456789	0-9999
56	Description Line 1	Char	32	alphanumeric	
57	Description Line 2	Char	32	alphanumeric	
58	Maint. Date	Char	16		MM-DD-YYHH:MM:SS
59	Day Glow Number	Num	6	0123456789	0-999999
60	Proportional Alt Tare	Boolean	1	01	
61	Turn Label	Boolean	1	01	
62	Date Forwarding	Boolean	1	01	
63	Line 2 size	Num	1	01234567	0-7
64	Sat. Graphic	Num	2	0123456789	0-15
65	Label Style	Num	1	01234567	0-7

ITEM FILE 2 (PRICING)

Field	Description	Type	Max Length	Valid Characters	Range
1	Department	Char	1	ABCDEFGHIJKLMNO	
2	Plu Number	Num	6	0123456789	1-999999
3	Price [Zone 1]	Num	7	.0123456789	0-999999
4	Price [Zone2]	Num	7	.0123456789	0-999999
5	Price [Zone 3]	Num	7	.0123456789	0-999999
6	Price [Zone 4]	Num	7	.0123456789	0-999999
7	Price [Zone 5]	Num	7	.0123456789	0-999999
8	Price [Zone 6]	Num	7	.0123456789	0-999999
9	Price [Zone 7]	Num	7	.0123456789	0-999999
10	Price [Zone 8]	Num	7	.0123456789	0-999999
11	Price [Zone 9]	Num	7	.0123456789	0-999999
12	Price [Zone 10]	Num	7	.0123456789	0-999999
13	Price [Zone 11]	Num	7	.0123456789	0-999999
14	Price [Zone 12]	Num	7	.0123456789	0-999999
15	Price [Zone 13]	Num	7	.0123456789	0-999999
16	Price [Zone 14]	Num	7	.0123456789	0-999999
17	Price [Zone 15]	Num	7	.0123456789	0-999999
18	Price [Zone 16]	Num	7	.0123456789	0-999999
19	Price [Zone 17]	Num	7	.0123456789	0-999999
20	Price [Zone 18]	Num	7	.0123456789	0-999999
21	Price [Zone 19]	Num	7	.0123456789	0-999999
22	Price [Zone 20]	Num	7	.0123456789	0-999999
23	Price [Zone 21]	Num	7	.0123456789	0-999999
24	Price [Zone 22]	Num	7	.0123456789	0-999999
25	Price [Zone 23]	Num	7	.0123456789	0-999999
26	Price [Zone 24]	Num	7	.0123456789	0-999999
27	Price [Zone 25]	Num	7	.0123456789	0-999999
28	Price [Zone 26]	Num	7	.0123456789	0-999999
29	Price [Zone 27]	Num	7	.0123456789	0-999999
30	Price [Zone 28]	Num	7	.0123456789	0-999999
31	Price [Zone 29]	Num	7	.0123456789	0-999999
32	Price [Zone 30]	Num	7	.0123456789	0-999999
33	Price [Zone 31]	Num	7	.0123456789	0-999999
34	Price [Zone 32]	Num	7	.0123456789	0-999999
35	Price [Zone 33]	Num	7	.0123456789	0-999999
36	Price [Zone 34]	Num	7	.0123456789	0-999999
37	Price [Zone 35]	Num	7	.0123456789	0-999999
38	Price [Zone 36]	Num	7	.0123456789	0-999999
39	Price [Zone 37]	Num	7	.0123456789	0-999999
40	Price [Zone 38]	Num	7	.0123456789	0-999999
41	Price [Zone 39]	Num	7	.0123456789	0-999999
42	Price [Zone 40]	Num	7	.0123456789	0-999999

43	Price [Zone 41]	Num	7	.0123456789	0-999999
44	Price [Zone 42]	Num	7	.0123456789	0-999999
45	Price [Zone 43]	Num	7	.0123456789	0-999999
46	Price [Zone 44]	Num	7	.0123456789	0-999999
47	Price [Zone 45]	Num	7	.0123456789	0-999999
48	Price [Zone 46]	Num	7	.0123456789	0-999999
49	Price [Zone 47]	Num	7	.0123456789	0-999999
50	Price [Zone 48]	Num	7	.0123456789	0-999999
51	Price [Zone 49]	Num	7	.0123456789	0-999999
52	Price [Zone 50]	Num	7	.0123456789	0-999999
53	Price [Zone 51]	Num	7	.0123456789	0-999999
54	Price [Zone 52]	Num	7	.0123456789	0-999999
55	Price [Zone 53]	Num	7	.0123456789	0-999999
56	Price [Zone 54]	Num	7	.0123456789	0-999999
57	Price [Zone 55]	Num	7	.0123456789	0-999999
58	Price [Zone 56]	Num	7	.0123456789	0-999999
59	Price [Zone 57]	Num	7	.0123456789	0-999999
60	Price [Zone 58]	Num	7	.0123456789	0-999999
61	Price [Zone 59]	Num	7	.0123456789	0-999999
62	Price [Zone 60]	Num	7	.0123456789	0-999999
63	Price [Zone 61]	Num	7	.0123456789	0-999999
64	Price [Zone 62]	Num	7	.0123456789	0-999999
65	Price [Zone 63]	Num	7	.0123456789	0-999999
66	Price [Zone 64]	Num	7	.0123456789	0-999999
67	Price [Zone 65]	Num	7	.0123456789	0-999999
68	Price [Zone 66]	Num	7	.0123456789	0-999999
69	Price [Zone 67]	Num	7	.0123456789	0-999999
70	Price [Zone 68]	Num	7	.0123456789	0-999999
71	Price [Zone 69]	Num	7	.0123456789	0-999999
72	Price [Zone 70]	Num	7	.0123456789	0-999999
73	Price [Zone 71]	Num	7	.0123456789	0-999999
74	Price [Zone 72]	Num	7	.0123456789	0-999999
75	Price [Zone 73]	Num	7	.0123456789	0-999999
76	Price [Zone 74]	Num	7	.0123456789	0-999999
77	Price [Zone 75]	Num	7	.0123456789	0-999999
78	Price [Zone 76]	Num	7	.0123456789	0-999999
79	Price [Zone 77]	Num	7	.0123456789	0-999999
80	Price [Zone 78]	Num	7	.0123456789	0-999999
81	Price [Zone 79]	Num	7	.0123456789	0-999999
82	Price [Zone 80]	Num	7	.0123456789	0-999999
83	Price [Zone 81]	Num	7	.0123456789	0-999999
84	Price [Zone 82]	Num	7	.0123456789	0-999999
85	Price [Zone 83]	Num	7	.0123456789	0-999999
86	Price [Zone 84]	Num	7	.0123456789	0-999999
87	Price [Zone 85]	Num	7	.0123456789	0-999999
88	Price [Zone 86]	Num	7	.0123456789	0-999999
89	Price [Zone 87]	Num	7	.0123456789	0-999999
90	Price [Zone 88]	Num	7	.0123456789	0-999999
91	Price [Zone 89]	Num	7	.0123456789	0-999999
92	Price [Zone 90]	Num	7	.0123456789	0-999999
93	Price [Zone 91]	Num	7	.0123456789	0-999999

94	Price [Zone 92]	Num	7	.0123456789	0-999999
95	Price [Zone 93]	Num	7	.0123456789	0-999999
96	Price [Zone 94]	Num	7	.0123456789	0-999999
97	Price [Zone 95]	Num	7	.0123456789	0-999999
98	Price [Zone 96]	Num	7	.0123456789	0-999999
99	Price [Zone 97]	Num	7	.0123456789	0-999999
100	Price [Zone 98]	Num	7	.0123456789	0-999999
101	Price [Zone 99]	Num	7	.0123456789	0-999999

IMPORT/EXPORT NUTRITION FACT FILE

NUTRITION FACT TEXT FILE

Field	Description	Type	Max Length	Valid Characters	Range
1	Nutrition Number	Num	6	0123456789	1-999999
2	Label Format	Num	1	01	0=one label 1=two labels
3	Label Order	Num	1	01	0=Plu/NF 1=NF/Plu
4	Batch Mode	Num	1	01	0=alternate 1=group
5	Template	Num	1	0123	0=vertical 1=tabular 2=lin.landscap 3=lin. portrait
6	Data	Num	1	01	0=standard 1=simplified
7	Serving Units	Num	1	012	0=ounces 1=pieces 2=text
8	Serving Size Text	Char	28	Alphanumeric	
9	Serving Size	Num	4	0123456789	
10	Serving Size g.	Char	6	Alphanumeric	
11	Calories	Num	4	0123456789	
12	Calories fat	Num	4	0123456789	
13	Calories sat fat	Num	4	0123456789	
14	Servings per container	Char	10	Alphanumeric	
15	Total Fat (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
16	Total Fat (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
17	Saturated Fat (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
18	Saturated Fat (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
19	Polyunsaturated Fat (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘

20	Monounsaturated Fat (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
21	cholesterol (mg)	Char	6	0123456789mg	1st four chars are num followed by ‘mg‘
22	cholesterol (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
23	sodium (mg)	Char	6	0123456789mg	1st four chars are num followed by ‘mg‘
24	sodium (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
25	potassium (mg)	Char	6	0123456789mg	1st four chars are num followed by ‘mg‘
26	potassium (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
27	Total Carbohydrate (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
28	Total Carbohydrate (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
29	Dietary Fiber (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
30	Dietary Fiber (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
31	Soluble Fiber (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
32	insoluble fiber (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
33	sugar (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
34	sugar alcohol (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
35	other carbohydrate (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
36	protein (g)	Char	6	0123456789g	1st four chars are num followed by ‘g ‘
37	protein (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
38	vitamin a (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
39	beta-carotene (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
40	vitamin c (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
41	calcium (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
42	iron (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
43	vitamin d (%)	Char	6	0123456789%	1st four chars are num followed by ‘% ‘
44	vitamin e (%)	Char	6	0123456789%	1st four chars are

					num followed by '% '
45	thiamin (%)	Char	6	0123456789%	1st four chars are num followed by '% '
46	riboflavin (%)	Char	6	0123456789%	1st four chars are num followed by '% '
47	niacin (%)	Char	6	0123456789%	1st four chars are num followed by '% '
48	vitamin b6 (%)	Char	6	0123456789%	1st four chars are num followed by '% '
49	folate (%)	Char	6	0123456789%	1st four chars are num followed by '% '
50	vitamin b12 (%)	Char	6	0123456789%	1st four chars are num followed by '% '
51	biotin (%)	Char	6	0123456789%	1st four chars are num followed by '% '

52	pantothenic acid (%)	Char	6	0123456789%	1st four chars are num followed by '% '
53	phosphorus (%)	Char	6	0123456789%	1st four chars are num followed by '% '
54	iodine (%)	Char	6	0123456789%	1st four chars are num followed by '% '
55	Magnesium (%)	Char	6	0123456789%	1st four chars are num followed by '% '
56	zinc (%)	Char	6	0123456789%	1st four chars are num followed by '% '
57	copper (%)	Char	6	0123456789%	1st four chars are num followed by '% '
58	spare1	Char	6	alphanumeric	
59	spare2	Char	6	alphanumeric	
60	spare3	Char	6	alphanumeric	
61	spare4	Char	6	alphanumeric	
62	spare5	Char	6	alphanumeric	
63	spare6	Char	6	alphanumeric	
64	spare7	Char	6	alphanumeric	
65	spare8	Char	6	alphanumeric	

IMPORT/EXPORT FUTURE FILE

The fields are shown below in the order they will appear in the record. Record type is defined as follows:

X - Price Only Change

W - Modify

Z - Add

FUTURE FILE 1 (PRICING)

Field	Description	Type	Max Length	Valid Characters	Range
1	Department	Char	1	ABCDEFGHIJKLMNO	
2	Plu Number	Num	6	0123456789	1-999999
3	Vendor	Char	10	Alphanumeric	
4	Item Number	Num	10	0123456789	0-9999999999
5	Sale Flag	Boolean	1	01	
6	Class/Group	Num	3	0123456789	0-999
7	Modifier	Num	3	0123456789	0-999
8	Package Code	Num	1	01234	0-4
9	Cost	Num	7	.0123456789	0-999999
10	Grade[zone 1]	Num	2	0123456789	0-15
11	Grade[zone 2]	Num	2	0123456789	0-15
12	Grade[zone 3]	Num	2	0123456789	0-15
13	Grade[zone 4]	Num	2	0123456789	0-15
14	Grade[zone 5]	Num	2	0123456789	0-15
15	Grade[zone 6]	Num	2	0123456789	0-15
16	Grade[zone 7]	Num	2	0123456789	0-15
17	Grade[zone 8]	Num	2	0123456789	0-15
18	Grade[zone 9]	Num	2	0123456789	0-15
19	Grade[zone 10]	Num	2	0123456789	0-15
20	Shelf Life	Num	3	0123456789	0-999
21	Tare[zone 1]	Num	4	.0123456789	0-9999
22	Tare[zone 2]	Num	4	.0123456789	0-9999
23	Tare[zone 3]	Num	4	.0123456789	0-9999
24	Tare[zone 4]	Num	4	.0123456789	0-9999
25	Tare[zone 5]	Num	4	.0123456789	0-9999
26	Tare[zone 6]	Num	4	.0123456789	0-9999
27	Tare[zone 7]	Num	4	.0123456789	0-9999
28	Tare[zone 8]	Num	4	.0123456789	0-9999
29	Tare[zone 9]	Num	4	.0123456789	0-9999
30	Tare[zone 10]	Num	4	.0123456789	0-9999
31	Eat by	Num	3	0123456789	0-999
32	Extra Text Number	Num	6	0123456789	0-999999
33	Action Code	Num	2	0123456789	0-50
34	Nutrition Number	Num	6	0123456789	0-999999
35	Graphics Number	Num	6	0123456789	0-999999
36	Effective Date	Char	8	-0123456789	mm-dd-yy
37	Effective Hour	Num	2	0123456789	0-23
38	Bar Code Type	Num	2	0123456789	0,2-5,99
39	Weight Type	Num	1	0123456789	0-7
40	Blanked Shelf Life	Boolean	1	01	
41	Blanked Eat By	Boolean	1	01	
42	Blanked Pack Date	Boolean	1	01	
43	Blanked Weight	Boolean	1	01	
44	Blanked Unit Price	Boolean	1	01	
45	Blanked Total Price	Boolean	1	01	

46	Alt Tare[zone 1]	Num	4	.0123456789	0-9999
47	Alt Tare[zone 2]	Num	4	.0123456789	0-9999
48	Alt Tare[zone 3]	Num	4	.0123456789	0-9999
49	Alt Tare[zone 4]	Num	4	.0123456789	0-9999
50	Alt Tare[zone 5]	Num	4	.0123456789	0-9999
51	Alt Tare[zone 6]	Num	4	.0123456789	0-9999
52	Alt Tare[zone 7]	Num	4	.0123456789	0-9999
53	Alt Tare[zone 8]	Num	4	.0123456789	0-9999
54	Alt Tare[zone 9]	Num	4	.0123456789	0-9999
55	Alt Tare[zone 10]	Num	4	.0123456789	0-9999
56	Description Line 1	Char	32	alphanumeric	
57	Description Line 2	Char	32	alphanumeric	
58	Maint. Date	Char	16		MM-DD-YYHH:MM:SS
59	Day Glow Number	Num	6	0123456789	0-999999
60	Proportional Alt Tare	Boolean	1	01	
61	Turn Label	Boolean	1	01	
62	Date Forwarding	Boolean	1	01	
63	Line 2 size	Num	1	01234567	0-7
64	Sat. Graphic	Num	2	0123456789	0-15
65	Label Style	Num	1	01234567	0-7
66	Record Type	Char	1	XWZ	

FUTURE FILE 2 (PRICING)

Field	Description	Type	Max Length	Valid Characters	Range
1	Department	Char	1	ABCDEFGHIJKLMNO	
2	Plu Number	Num	6	0123456789	1-999999
3	Price [Zone 1]	Num	7	.0123456789	0-999999
4	Price [Zone2]	Num	7	.0123456789	0-999999
5	Price [Zone 3]	Num	7	.0123456789	0-999999
6	Price [Zone 4]	Num	7	.0123456789	0-999999
7	Price [Zone 5]	Num	7	.0123456789	0-999999
8	Price [Zone 6]	Num	7	.0123456789	0-999999
9	Price [Zone 7]	Num	7	.0123456789	0-999999
10	Price [Zone 8]	Num	7	.0123456789	0-999999
11	Price [Zone 9]	Num	7	.0123456789	0-999999
12	Price [Zone 10]	Num	7	.0123456789	0-999999
13	Price [Zone 11]	Num	7	.0123456789	0-999999
14	Price [Zone 12]	Num	7	.0123456789	0-999999
15	Price [Zone 13]	Num	7	.0123456789	0-999999
16	Price [Zone 14]	Num	7	.0123456789	0-999999
17	Price [Zone 15]	Num	7	.0123456789	0-999999
18	Price [Zone 16]	Num	7	.0123456789	0-999999
19	Price [Zone 17]	Num	7	.0123456789	0-999999
20	Price [Zone 18]	Num	7	.0123456789	0-999999
21	Price [Zone 19]	Num	7	.0123456789	0-999999

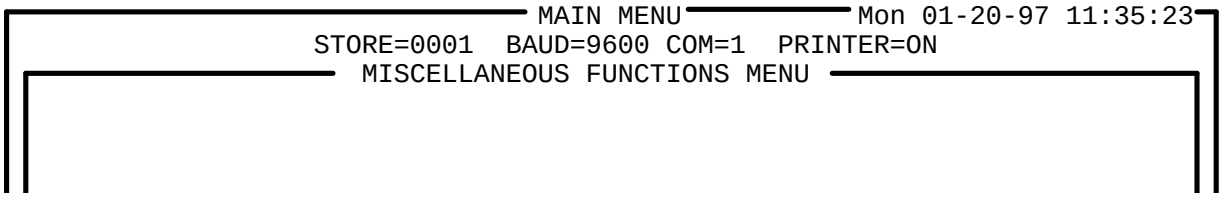
22	Price [Zone 20]	Num	7	.0123456789	0-999999
23	Price [Zone 21]	Num	7	.0123456789	0-999999
24	Price [Zone 22]	Num	7	.0123456789	0-999999
25	Price [Zone 23]	Num	7	.0123456789	0-999999
26	Price [Zone 24]	Num	7	.0123456789	0-999999
27	Price [Zone 25]	Num	7	.0123456789	0-999999
28	Price [Zone 26]	Num	7	.0123456789	0-999999
29	Price [Zone 27]	Num	7	.0123456789	0-999999
30	Price [Zone 28]	Num	7	.0123456789	0-999999
31	Price [Zone 29]	Num	7	.0123456789	0-999999
32	Price [Zone 30]	Num	7	.0123456789	0-999999
33	Price [Zone 31]	Num	7	.0123456789	0-999999
34	Price [Zone 32]	Num	7	.0123456789	0-999999
35	Price [Zone 33]	Num	7	.0123456789	0-999999
36	Price [Zone 34]	Num	7	.0123456789	0-999999
37	Price [Zone 35]	Num	7	.0123456789	0-999999
38	Price [Zone 36]	Num	7	.0123456789	0-999999
39	Price [Zone 37]	Num	7	.0123456789	0-999999
40	Price [Zone 38]	Num	7	.0123456789	0-999999
41	Price [Zone 39]	Num	7	.0123456789	0-999999
42	Price [Zone 40]	Num	7	.0123456789	0-999999
43	Price [Zone 41]	Num	7	.0123456789	0-999999
44	Price [Zone 42]	Num	7	.0123456789	0-999999
45	Price [Zone 43]	Num	7	.0123456789	0-999999
46	Price [Zone 44]	Num	7	.0123456789	0-999999
47	Price [Zone 45]	Num	7	.0123456789	0-999999
48	Price [Zone 46]	Num	7	.0123456789	0-999999
49	Price [Zone 47]	Num	7	.0123456789	0-999999
50	Price [Zone 48]	Num	7	.0123456789	0-999999
51	Price [Zone 49]	Num	7	.0123456789	0-999999
52	Price [Zone 50]	Num	7	.0123456789	0-999999
53	Price [Zone 51]	Num	7	.0123456789	0-999999
54	Price [Zone 52]	Num	7	.0123456789	0-999999
55	Price [Zone 53]	Num	7	.0123456789	0-999999
56	Price [Zone 54]	Num	7	.0123456789	0-999999
57	Price [Zone 55]	Num	7	.0123456789	0-999999
58	Price [Zone 56]	Num	7	.0123456789	0-999999
59	Price [Zone 57]	Num	7	.0123456789	0-999999
60	Price [Zone 58]	Num	7	.0123456789	0-999999
61	Price [Zone 59]	Num	7	.0123456789	0-999999
62	Price [Zone 60]	Num	7	.0123456789	0-999999
63	Price [Zone 61]	Num	7	.0123456789	0-999999
64	Price [Zone 62]	Num	7	.0123456789	0-999999
65	Price [Zone 63]	Num	7	.0123456789	0-999999
66	Price [Zone 64]	Num	7	.0123456789	0-999999
67	Price [Zone 65]	Num	7	.0123456789	0-999999
68	Price [Zone 66]	Num	7	.0123456789	0-999999
69	Price [Zone 67]	Num	7	.0123456789	0-999999
70	Price [Zone 68]	Num	7	.0123456789	0-999999
71	Price [Zone 69]	Num	7	.0123456789	0-999999
72	Price [Zone 70]	Num	7	.0123456789	0-999999

73	Price [Zone 71]	Num	7	.0123456789	0-999999
74	Price [Zone 72]	Num	7	.0123456789	0-999999
75	Price [Zone 73]	Num	7	.0123456789	0-999999
76	Price [Zone 74]	Num	7	.0123456789	0-999999
77	Price [Zone 75]	Num	7	.0123456789	0-999999
78	Price [Zone 76]	Num	7	.0123456789	0-999999
79	Price [Zone 77]	Num	7	.0123456789	0-999999
80	Price [Zone 78]	Num	7	.0123456789	0-999999
81	Price [Zone 79]	Num	7	.0123456789	0-999999
82	Price [Zone 80]	Num	7	.0123456789	0-999999
83	Price [Zone 81]	Num	7	.0123456789	0-999999
84	Price [Zone 82]	Num	7	.0123456789	0-999999
85	Price [Zone 83]	Num	7	.0123456789	0-999999
86	Price [Zone 84]	Num	7	.0123456789	0-999999
87	Price [Zone 85]	Num	7	.0123456789	0-999999
88	Price [Zone 86]	Num	7	.0123456789	0-999999
89	Price [Zone 87]	Num	7	.0123456789	0-999999
90	Price [Zone 88]	Num	7	.0123456789	0-999999
91	Price [Zone 89]	Num	7	.0123456789	0-999999
92	Price [Zone 90]	Num	7	.0123456789	0-999999
93	Price [Zone 91]	Num	7	.0123456789	0-999999
94	Price [Zone 92]	Num	7	.0123456789	0-999999
95	Price [Zone 93]	Num	7	.0123456789	0-999999
96	Price [Zone 94]	Num	7	.0123456789	0-999999
97	Price [Zone 95]	Num	7	.0123456789	0-999999
98	Price [Zone 96]	Num	7	.0123456789	0-999999
99	Price [Zone 97]	Num	7	.0123456789	0-999999
100	Price [Zone 98]	Num	7	.0123456789	0-999999
101	Price [Zone 99]	Num	7	.0123456789	0-999999

Verify Scale Data For One Scale

The Miscellaneous Functions Menu selection, **Verify Scale Data For One Scale**, can be used to compare the data in a scale's PLU file with the contents of the **Intelli-Net** department PLU file. This function could be performed if it is suspected an unauthorized modification was made to the scale's PLU file directly at the scale and not through the **Intelli-Net** program.

To start the verification process, select **Verify Scale Data For One Scale** from the Miscellaneous Functions Menu. You must then supply the scale address number of the scale to verify, as shown in Figure 4.9.4.



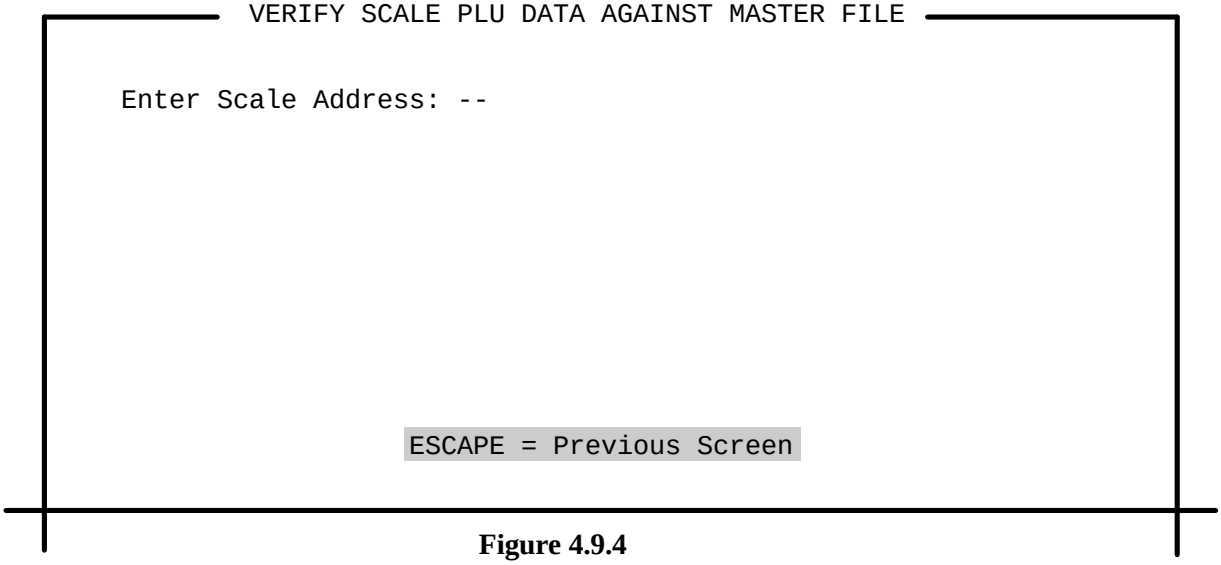


Figure 4.9.4

After typing in the scale address number, **Intelli-Net** will upload the scale PLU data file into a temporary disk file that will be used to compare the scale data with the data in the **Intelli-Net** master PLU file. (Note: only the PLU file will be compared. The extra text file and action message file will not be verified.) As the records are uploaded, a status message will display showing the scale address, department code, scale type, and the PLU numbers under the **STATUS** column, as they are uploaded, as shown in Figure 4.9.5.

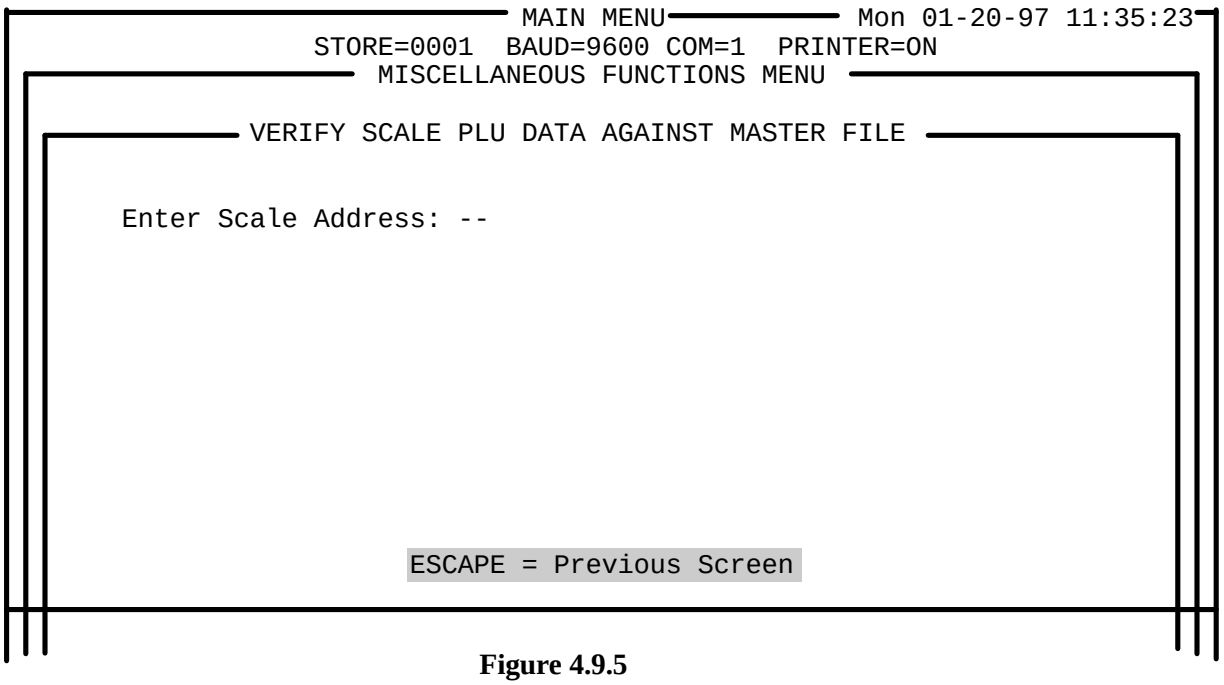


Figure 4.9.5

After the upload is complete, you must select the departments that you wish to run the verify procedure on. Once you select one or more departments, the uploaded records will be compared with the **Intelli-Net** master PLU file. If any record fields do not match, the record will be printed on the PC's printer, or to the log file if the printer is toggled OFF. The complete **Intelli-Net** record and the scale record will be printed and identified as originating from the **SCALE** or **MASTER** (Intelli-Net). If the files do not match, you may want to use the Department Functions Menu selection **Copy PLU File To Scale(s).** This will completely over-write the existing file in the scale with the department PLU file in the PC.

Backup/Restore Data Files

The DOS backup and restore functions must be specifically loaded when DOS 6.0 or higher is installed for the Intelli-Net Backup/Restore function to operate.

Using the **Backup/Restore Data Files** function will allow you to:

- Backup (write) all or selected data files to floppy diskettes.
- Restore (read) all or selected previously backed-up data files from a floppy diskette to the hard disk drive.

The Backup function should be performed on a regular basis to protect against loss of data in the event of PC hard disk or equipment failure. The **Intelli-Net** backup function uses the DOS Backup program which allows files or groups of files to be written to multiple floppy diskettes if the file(s) will not fit on a single floppy. For the backup or restore functions to operate, you must have a path statement in your **AUTOEXEC.BAT** file stating the location of the DOS files BACKUP.COM and RESTORE.COM. If you are backing up to a diskette that was previously used to backup data, the backup program will completely overwrite any existing data on the diskette. (It does not append data!). If you wish to save early backups, use a new diskette for the backup.

Backup Data Files To Diskette

Backup requires one or more blank formatted diskettes. Before starting the backup procedure, make sure you have enough blank, formatted diskettes to hold all of the data you wish to backup to a floppy diskette. Formatted diskette storage capacities of the various diskette sizes are as follows:

5.25" Double Density = 360 K

5.25" High Density = 1.2 Meg

3.5" Double Density = 720 K

3.5" High Density = 1.44 Meg

To backup **Intelli-Net** data files to a floppy diskette, select **Backup/Restore Data Files** from the Miscellaneous Functions Menu, then select **Backup Data Files To Diskette**, as shown in Figure 4.9.6.

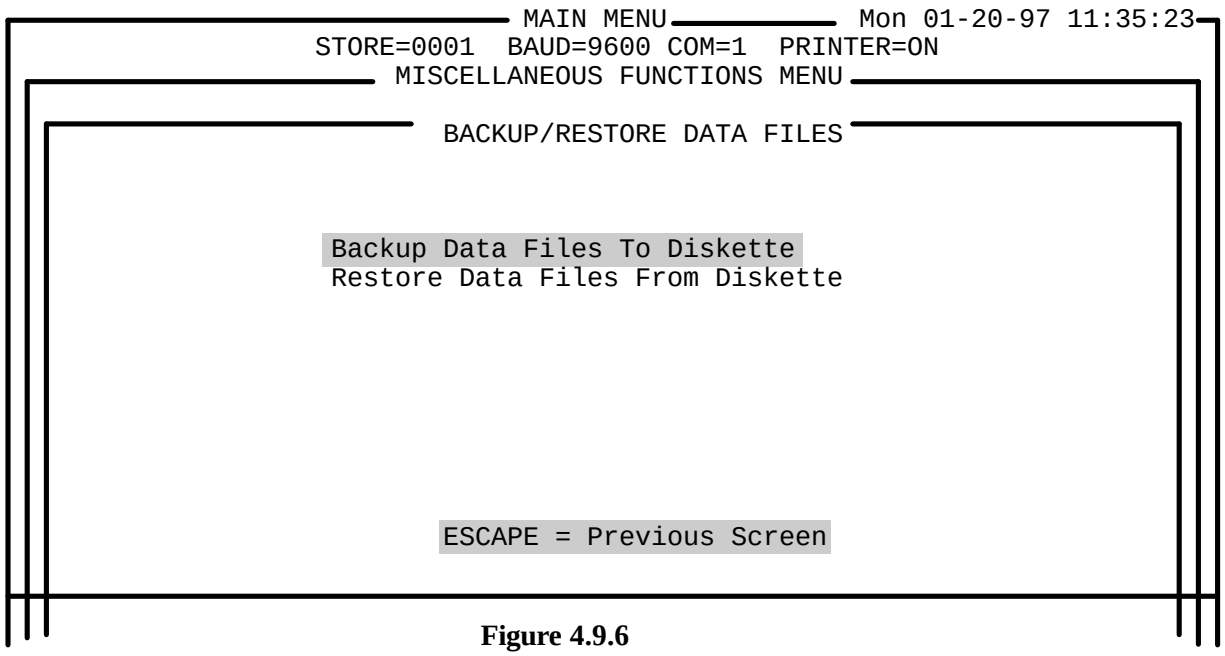
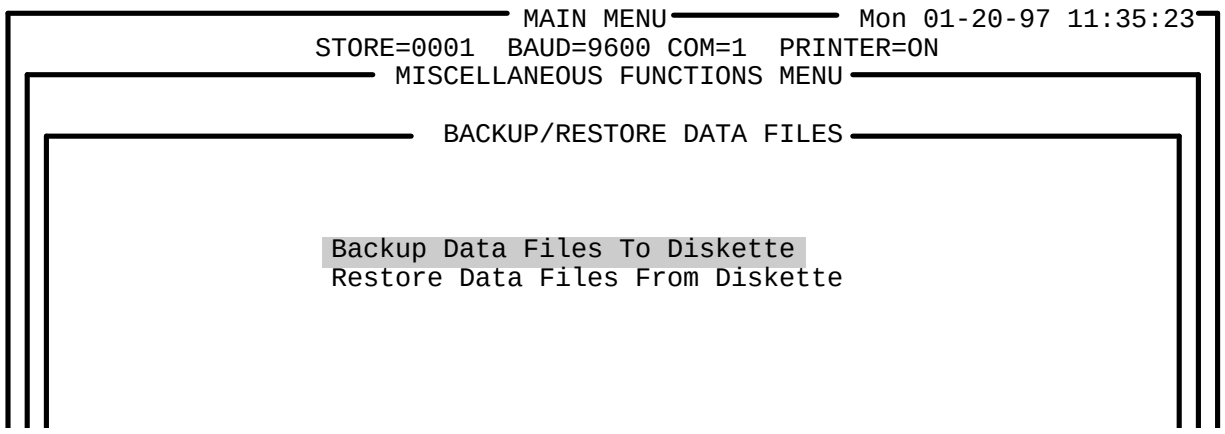


Figure 4.9.6

Next insert a blank, formatted diskette into the floppy drive you will be using for a backup, then type in the destination drive for the backup. Enter **A** to backup files to floppy drive A, or type in **B** to backup files to floppy drive B, as shown in Figure 4.9.7. **On-Line HELP** is available by pressing the **F1** function key.



```
Enter Destination Drive (A/B):
```

Figure 4.9.7

After typing in the destination drive letter (A/B), you can now select the files to backup. The Backup Menu is shown in Figure 4.9.8.

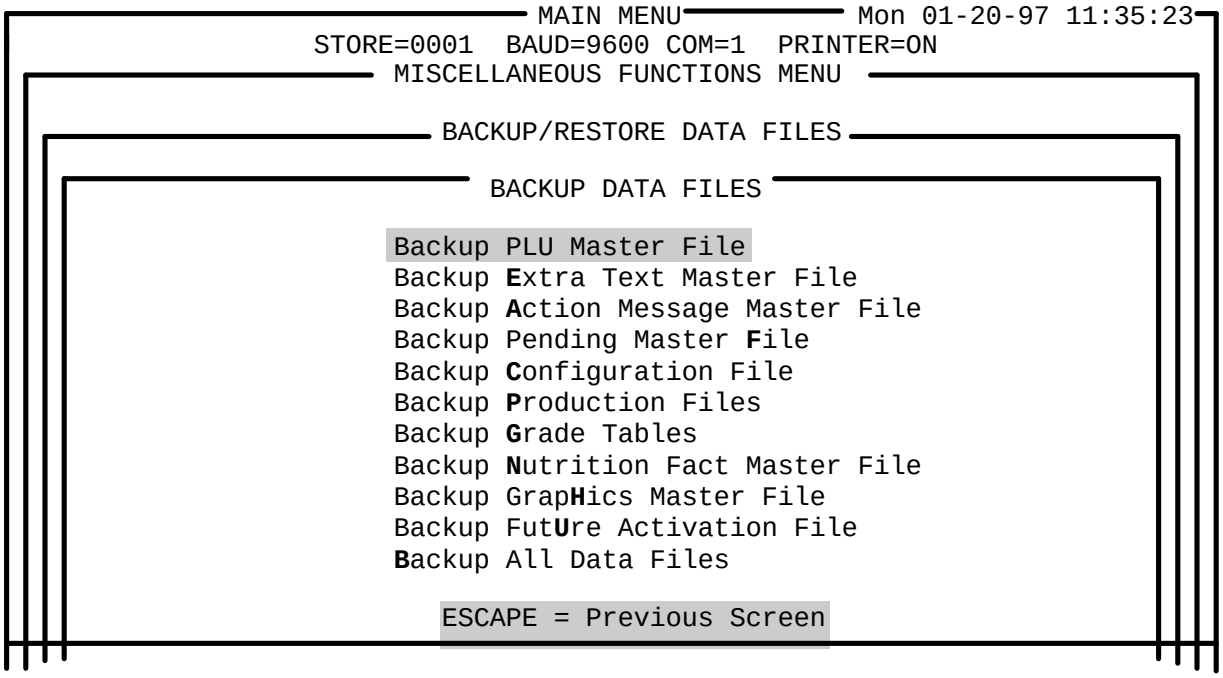
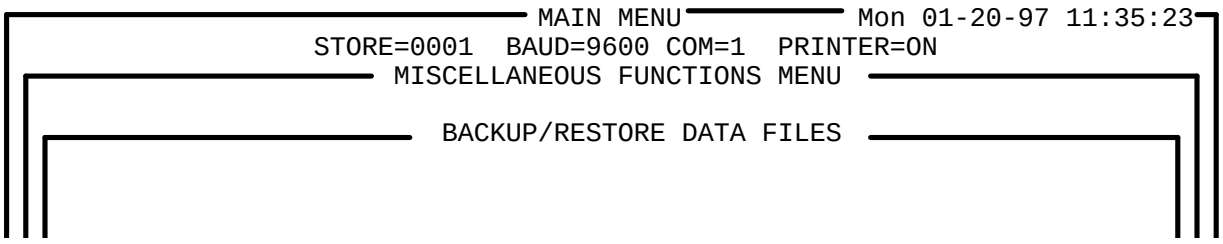


Figure 4.9.8

You can now select individual files for backup, or all files. You will be issued a warning that existing data on the diskettes will be erased to give a last chance to abort the procedure. Press **ESC** to abort or any other key to proceed. If the files will not fit on one diskette, you will be prompted to remove diskette #1 and insert diskette #2, etc. Label the diskettes by number so they can be identified later.

If no errors occur, you will be returned to the previous menu. Press **ESC** to return to previous menu's, or you can select other files for backup.

Next insert your backup diskette #1 into the floppy drive you will be using, then type in the source drive (A/B), as shown in Figure 4.9.10.



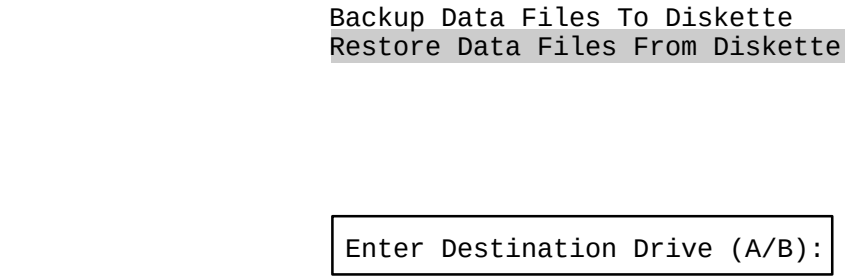

Backup Data Files To Diskette
Restore Data Files From Diskette
Enter Destination Drive (A/B):

Figure 4.9.10

After typing in the source drive letter (A/B), you can now select the files to restore. The Restore Data Files Menu is shown in Figure 4.9.11.

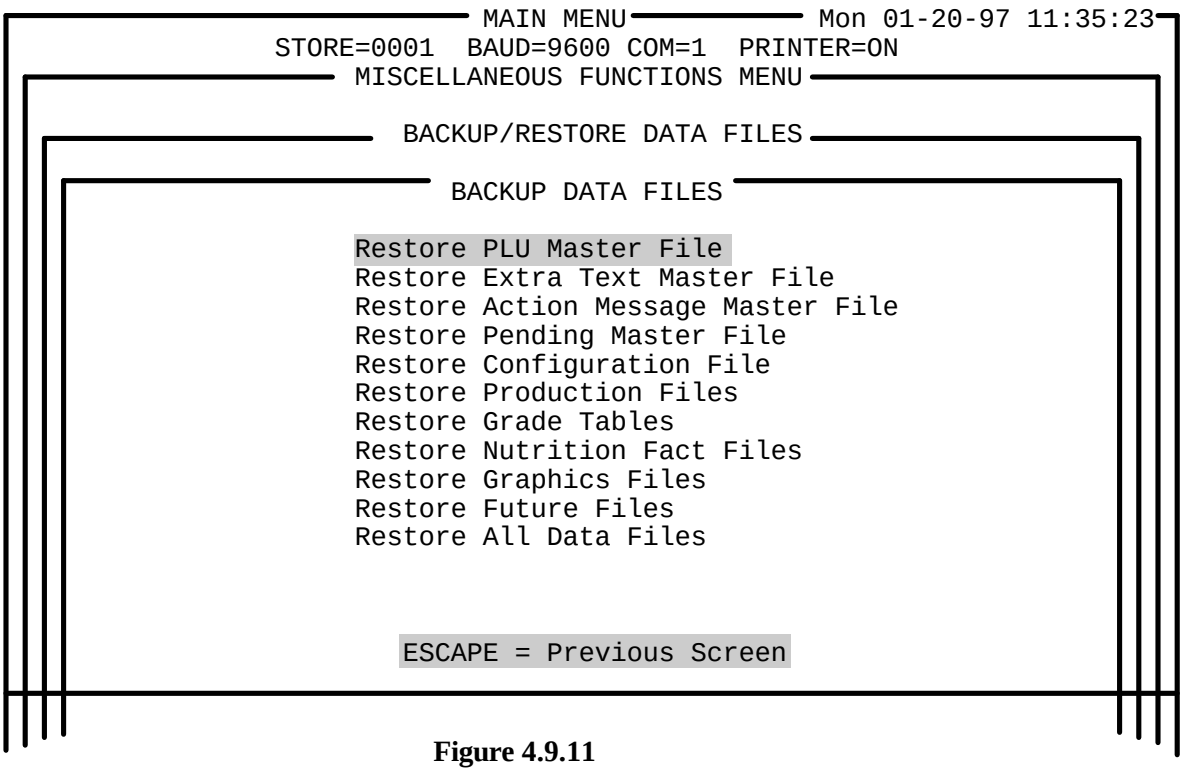


Figure 4.9.11

You can now restore individual files, or all files. You will be asked for final confirmation, then the restore procedure will begin. Press **ESC** to abort or any other key to proceed. If the files were backed up on multiple diskettes, you will be prompted to remove diskette #1 and insert diskette #2, etc. If no errors occur, you will be returned to the previous menu. Press **ESC** to return to previous menu's, or you can select other files to restore.

Download Current Time To Scales

This function can be used to update the scale clocks with the time programmed in the PC's clock. The clocks in type 4 and type 6 scales can't be updated using this function. If a scale cannot accept the time/date, **ERR** will display. The scale should be checked to verify it is in an idle/ready mode before attempting to send the time/date again.

Display Count Of ET/PLU Records

This function can be used to display a grand total of the extra text and the PLU records currently residing in Intelli-Net.

Rebuild Intelli-Net Database Indexes

Use this selection if the Intelli-Net database index files need to be rebuilt. Examples may include: loss of **.IX0** files, loss of data integrity between data files and index files, key violation errors, system/hardware failure while updating the data files, or turning off or rebooting the computer without properly exiting the Intelli-Net program, or if a Turbo I/O error 100 is reported when attempting to read/write a data file.

Change Default Directory

Different subdirectories can be created to maintain more than one data base. All Intelli-Net data files must reside in the directory you choose. If not Intelli-Net will warn you and return to the operating system.

Delete All Linked Records in the Scale

Linked records include extra text records, nutrition facts records, and graphics records. If this function is used, it will delete all of these records from the selected scale.

Compress Memory in the Scale

When a record is deleted from a scale, empty memory is left, but it is not accessible, as it is a very small bit of memory in the midst of the remaining records. This function will compress the remaining records, pushing all these little bits of blank memory into a single conglomeration which can then be accessed for storing more records.

Copy PLUs From One Department to Another

This function can be used to copy a range of PLU's from one department to another. The range can be as small as 1 PLU or as large as all of the PLU's.

Collect Production Data

The **Collect Production Data** menu allows the operator to collect active production totals, obsolete production totals, and operator totals, Obsolete totals and operator totals are only available with type 9 scales.

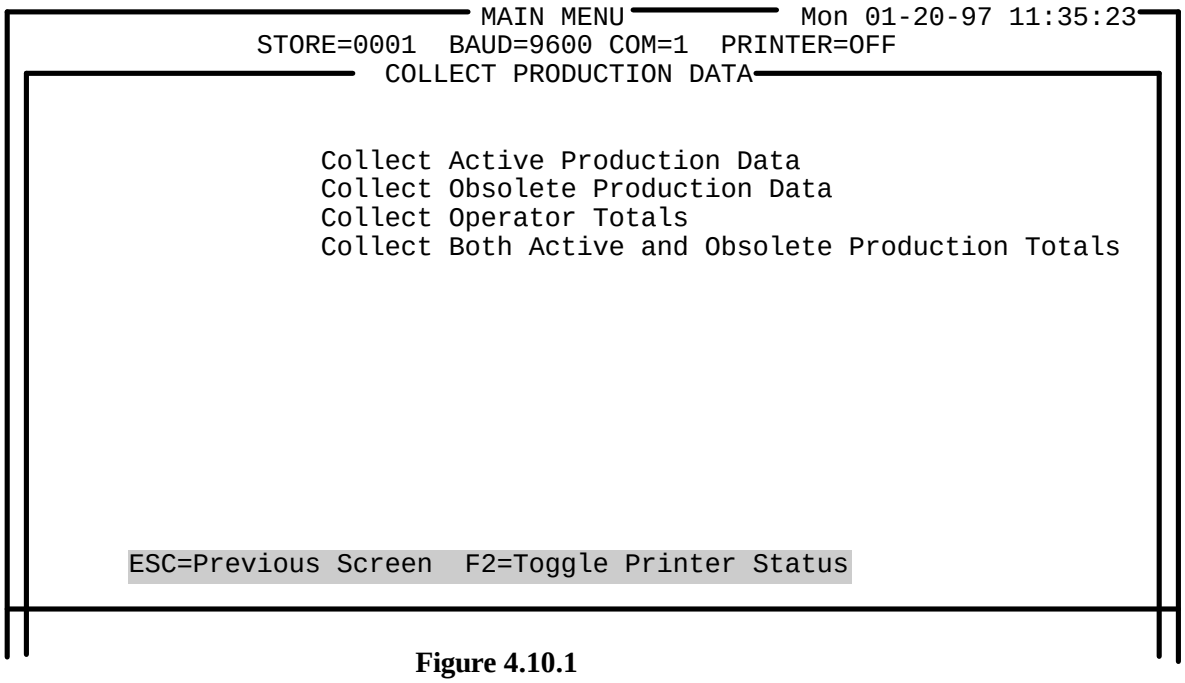
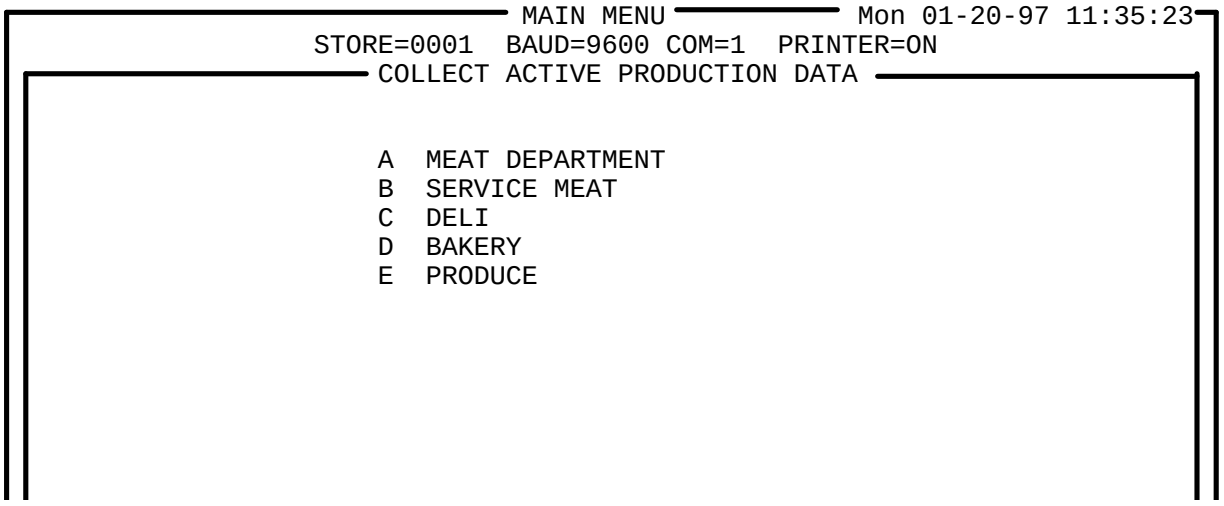


Figure 4.10.1

Collect Active Production Data

An unattended automatic collection session can be setup in **Intelli-Net** using the **Collect Production Data** main menu selection. The **Collect Production Data** function will automatically connect to preselected stores, gather data from the scale accumulators from all scales in preselected departments, and store the data for each store and department in a file on the hard disk drive. If desired, reports can be printed after the data has been collected from the scales. You will have a choice of collecting any combination of departments from any combination of stores. When there are multiple scales in a department, the data from all of the scales will be summed in one department total. To start the collection process, select **Collect Production Data** from the Main Menu then select **Collect Active Production Data**. You will be asked if this is a normal collection. For a normal collection, enter **Y** (Yes). You will next see the **Select Department** screen, as shown in Figure 4.10.2.



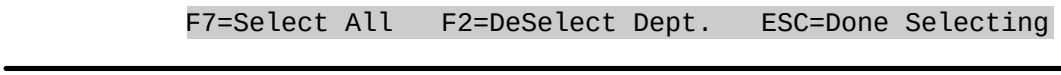


Figure 4.10.2

Five departments are shown in Figure 4.10.2. To select a department, first highlight the department, then press **ENTER**. Keep repeating this procedure until you have selected all desired departments. Selected departments will remain highlighted. When you have completed selecting departments for production totals collection, press the **ESC** key.

You will next be asked **"Clear The Accumulators In The Scales (Y/N)"**. Type in **Y** for Yes, or **N** for No, as shown in Figure 4.10.3.

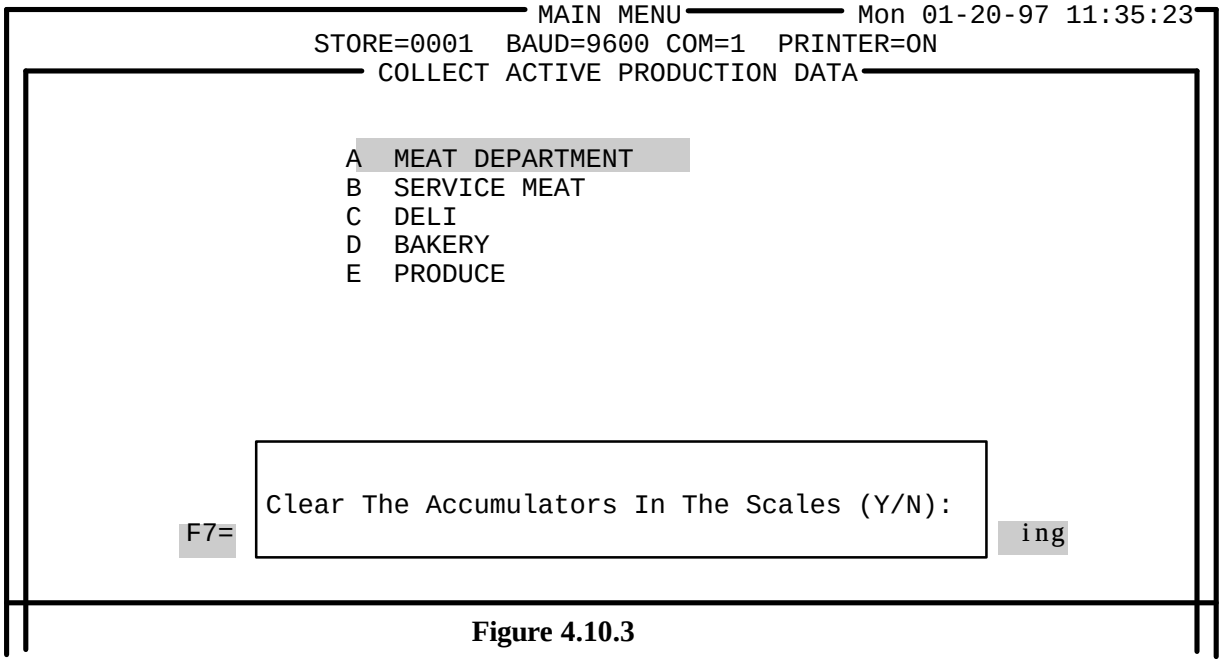


Figure 4.10.3

If you answer **Y**es (to Clear Accumulators), the scale accumulators will be cleared. Answering **N**o will not clear the accumulators in the scales, and **Intelli-Net** will collect the data and add the data to the existing totals files on the hard disk. You will next be asked to **Select Stores**.

Highlight the store and press **ENTER** to select individual stores, or press **F7** to select all stores, as shown in Figure 4.10.4. Press **ESC** when you have completed selecting stores. The program will now prompt you for the production report prefix.The default prefix is “ACC”. You will then be asked if you wish to print reports after collecting data. Press **Y** to select reports or **N** to not print any reports.

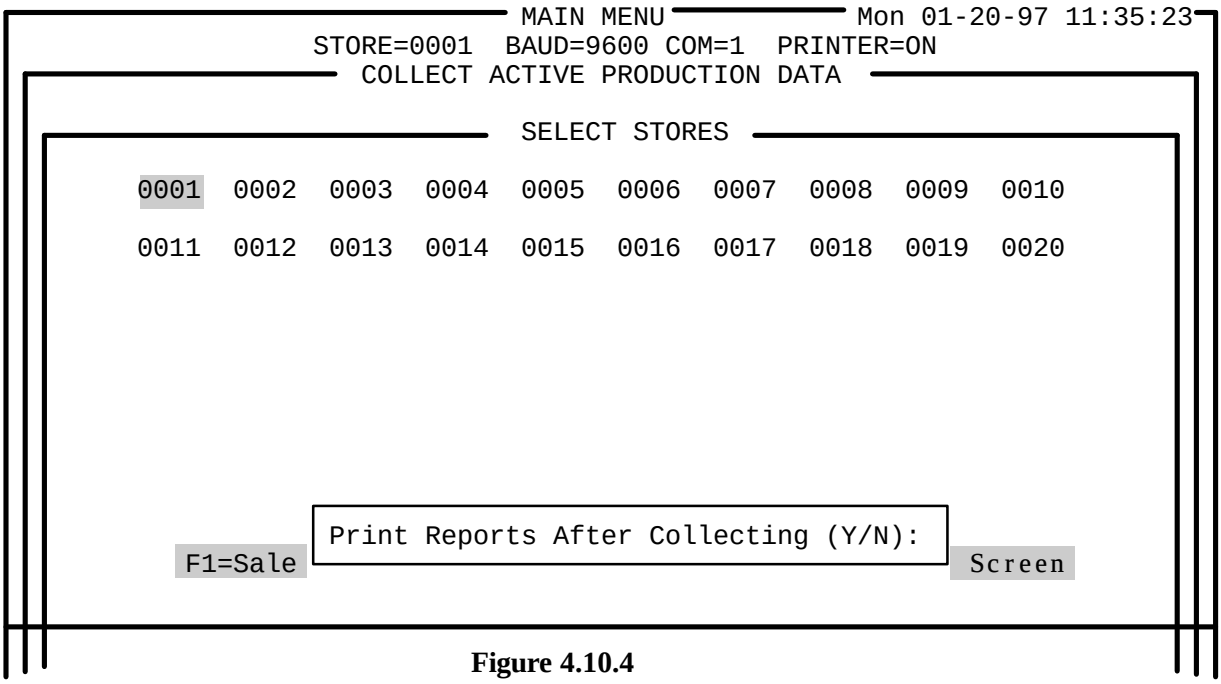


Figure 4.10.4

Select Reports (Optional)

If you answered **Y**es to print reports after collecting totals data, you will be asked to select a report format. In order to select a report, it must have already been configured. (Refer to the **Configuration Menu**). To select a report format, highlight the report name and press **ENTER**, as shown in Figure 4.10.5.

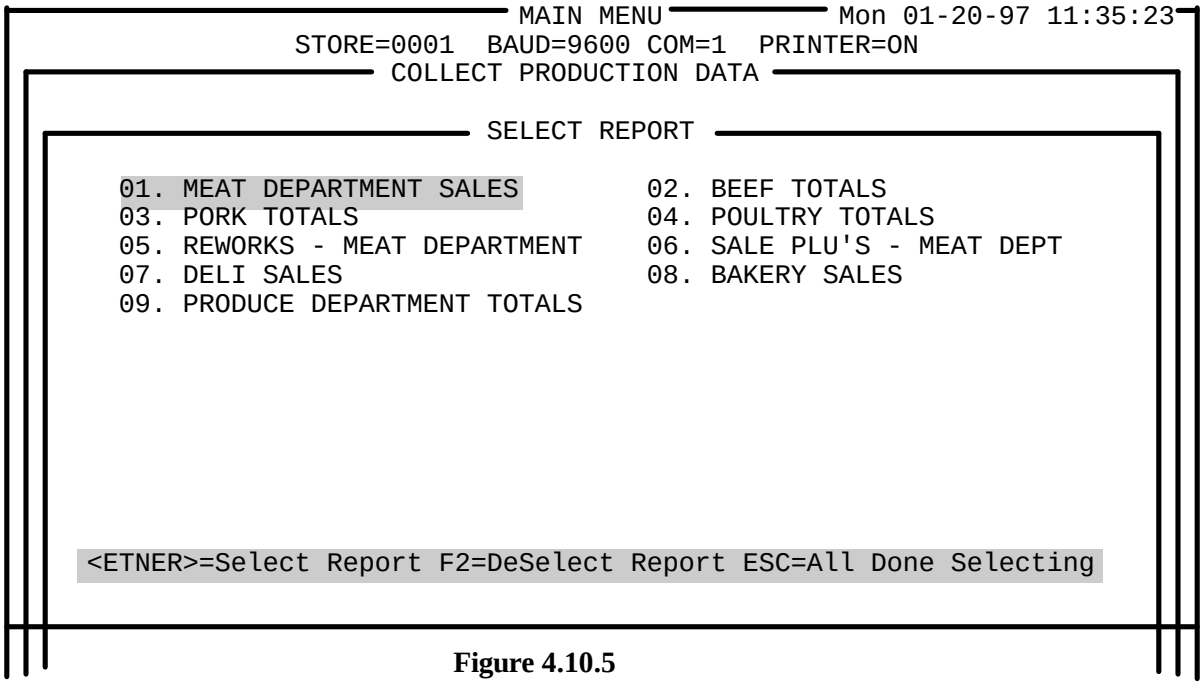


Figure 4.10.5

After selecting a report format, you will next be asked to select the stores you wish to print the report for after totals data has been collected, as shown in Figure 4.10.6

You will next see a display of all configured store numbers, as shown in Figure 4.10.6. You can select one or more stores by highlighting the store number, then press the **ENTER** key, or press **<F7>** to select all stores. To deselect a store, press **<F2>**. The selected stores will remain highlighted.

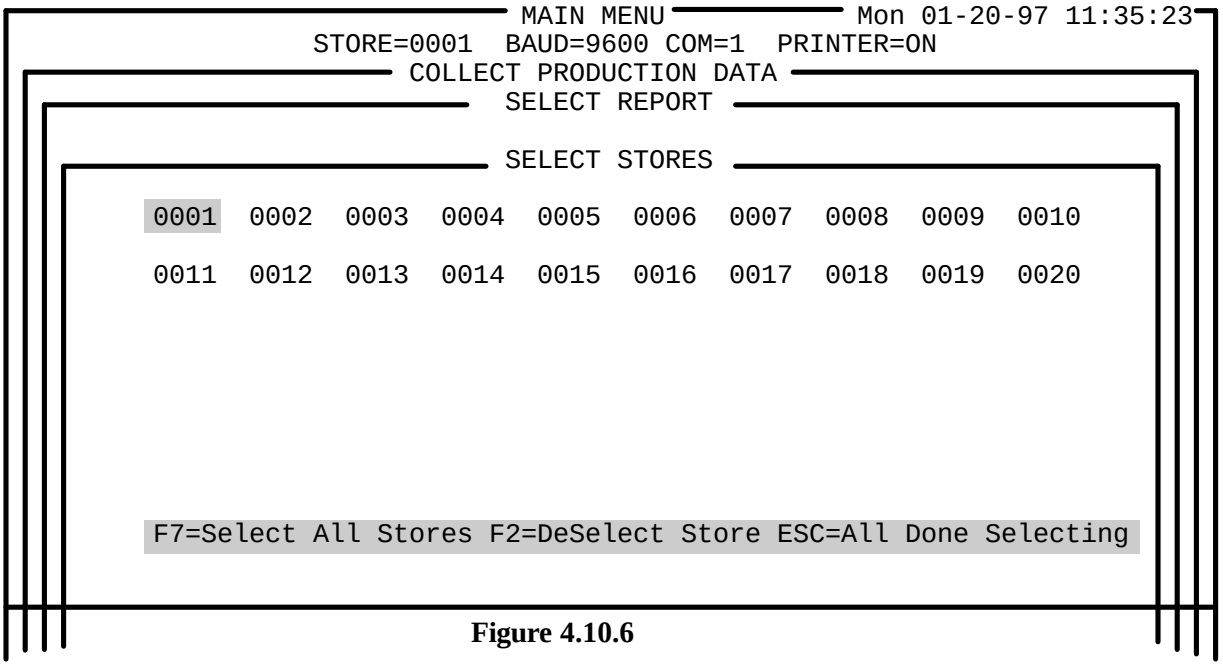
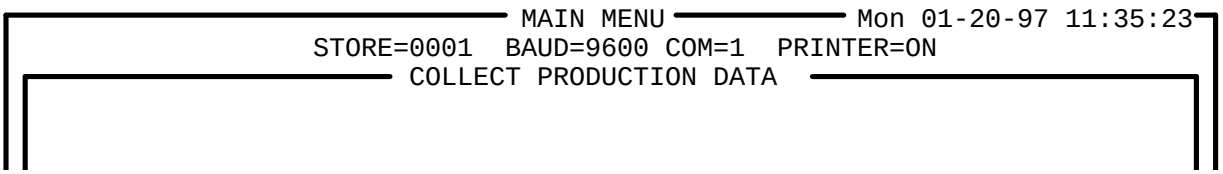


Figure 4.10.6

When all desired stores have been selected, press the **ESC** key. You will be returned to the **SELECT REPORT** screen. You can now select another report, or press **ESC** if you are finished selecting reports. When you are finished you will be asked to verify your selections. Press **Y** to continue, or **N** to redo or abort the procedure. You will now be asked if you wish to convert the data to Lotus format after collecting. If you enter **Y** (Yes) to this prompt, you will be asked to enter the name of the file to which this data will be exported. Enter a name for the file or just press **ENTER** to accept the default name "ACCPROD.PRN". If you do not wish to convert the file after collecting, press **N** (No). You will then be see the starting time screen, as shown in Figure 4.10.7.

Exiting to DOS can be useful to run other programs that can do post processing on the report files. Run Intelli-Net in a DOS batch file to take advantage of this feature.

The data collection process can be started immediately, or programmed to start at a later date. To start the collection process immediately, just press the **ENTER** key to automatically enter the current date and time. If you wish to start the collection process at a later date or time, type in the date and time you wish the unattended collection procedure to begin. The date must be entered in the format **MM-DD-YY**, (example: 10-11-90). The time must be entered in a 24 hour format **HH:MM** (example: 3:00 P.M. would be entered as 15:00). Make sure the PC's printer is on-line and ready to print before proceeding. You will be prompted to **EXIT TO DOS** on completion. If you enter **Y**es to this prompt, Intelli-Net will end its session and return to the DOS prompt once all data has been collected, converted to Lotus (if selected), and reports have been printed (if selected). If you do not wish to exit to DOS on completion, enter **N**o. Press **Y**es to continue, or **N**o to redo your selections or abort when you see the **Is Everything OK (Y/N)** prompt. A log of the session will be printed to the log file. Figure 4.10.6 shows the start time selection screen.



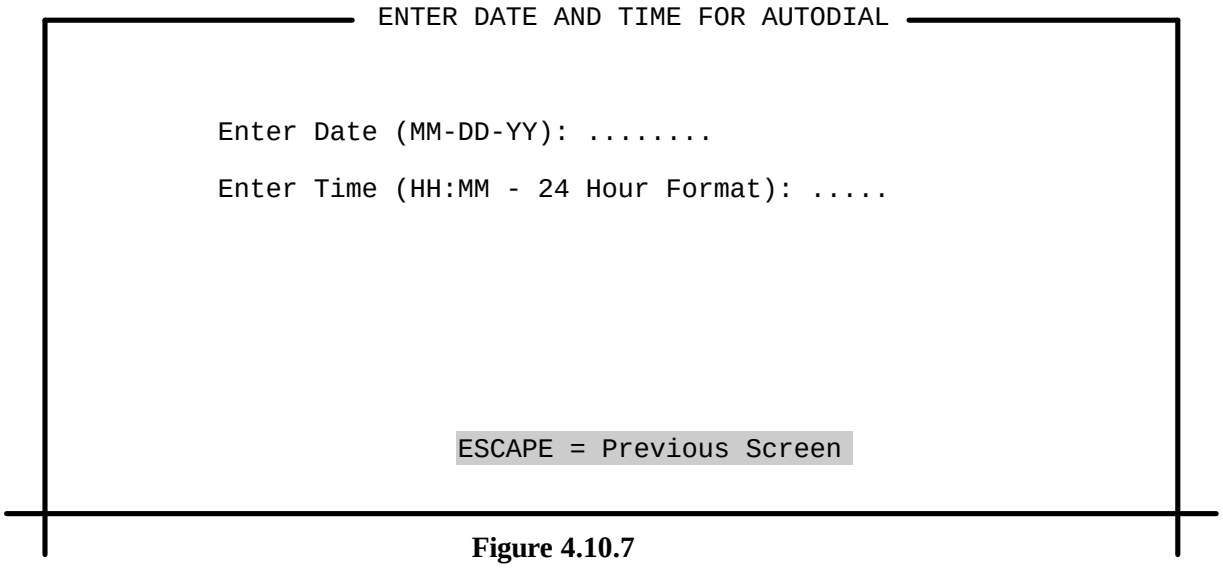


Figure 4.10.7

If the collection process has been programmed to start at a later date or time, the system will stay in this mode until the programmed date/time match the current date/time. **DURING THIS TIME, THE PC CANNOT BE USED FOR OTHER TASKS.**

When the date/time match the current time, the stores that have been selected will be dialed up by the modem. When **Intelli-Net** connects to each store, the scales in each department selected will be polled for data, and all non-zero accumulators will be collected. When complete, the data will be stored in a disk file for the respective prefix, store and department. If reports have been selected for printing, the reports will then print on the PC's printer, or to the log file if the printer has been toggled **OFF**.

If a connection with a remote store cannot be completed in the first round, **Intelli-Net** will automatically attempt to connect with the store a second time. In either case, the log will show all events that took place during the session. After the collection session is completed, the log of events can be viewed by selecting **View Log File** from the **Miscellaneous Functions Menu**.

If you answered **N** (No) to **Is This a Normal Collection**, the screen will prompt you to enter specific PLUs that you wish to do a collection for. Enter the department and the PLU number for each of the PLUs that you wish totals for. You can enter up to 48 specific PLUs. Only totals for the PLUs specified will be collected. Press **ESC**ape when done entering PLUs. The remainder of the sequence is the same as normal collection. See "**Clear the accumulators in the scales**".

Collect Obsolete Production Data

This feature is only available on type 9 scales. It functions exactly the same as **collect active production data** except you cannot specify specific PLUs. This function will request the totals for all PLUs that have been obsoleted.

Collect Operator Totals

This feature is only available on type 9 scales. If you have operators enabled on the 8460, it will accumulate totals on an operator level. You will be asked to select departments and stores you wish to collect from. You will be asked if you want to clear the operators totals and if you want to print the operator totals report after collecting. The remainder of the sequence is the same as **collect active production totals**

Collect Both Active and Obsolete Production Totals

This feature functions the same as Collect Active Production data except that both active and obsolete totals will be collected.

Print Reports

The Main Menu selection, **PRINT REPORTS**, is used to select the following reports for printing:

Print Production Reports

This selection is used to print **pre-configured** production reports for production totals collected during a **COLLECT PRODUCTION DATA** session. The reports must be pre-configured using the **F5 CONFIGURATION** function key at the Main Menu and **ADD\MODIFY\DELETE REPORTS** at the Configuration Menu. Batches of up to 30 reports can be printed in one session by selecting different reports in one session.

Three different types of reports can be printed using this function: Active Production Data, Obsolete Production Data, and Operator Totals. You must have already collected the data using the **collect production data** function.

Print PLU Master Listing

This function will print a detailed listing of the PLU file by department, for all departments configured in **Intelli-Net**.

Print Extra Text Master Listing

This report will print a selected range of extra text records**.**

Print Nutrition Fact Master Listing

This function will print a detailed listing of all of the nutrition fact records.

Print Action Message File Listing

This function will print a listing of all action messages.

Collect/Print Cutting Tests Report

When the Cutting Tests Report function is selected, **Intelli-Net** will collect data from a type 4, type 6, and type 9 master scale then print a report based on the collected data from previously run cutting tests. Cutting tests can only be run on the model 8305 and model 8360 scale (master or satellite).

The cutting test will report the saleable yield, cutting loss/shrink, and gross margin of the product tested. Refer to the model 8305 Operator Manual and Supervisor Programming Manual for test procedures.

To start the cutting test, select **Collect/Print Cutting Tests Report** from the Print Reports Menu. You must then type in the scale address of the Host (master) scale. I.D. numbers must be between 1 and 99. Next, you must type in the Scale I.D. of the 8305 or 8360 satellite that will be polled for the data must be between 1 to 24.

Do not use a satellite ID greater than 24 or the cutting test will not function correctly. Once these numbers are entered, you will be asked if a report should be printed once the data has been collected.

The Scale I.D. is the number the master scale uses to identify a satellite on the master/satellite network. This number should not be confused with the scale address the host uses to identify a scale on the **Intelli-Net** network. The Scale I.D. can be displayed on the model 8305 by pressing the **F7 Display Scale ID** key on the front panel. The 8360 scale I.D. is displayed on the top center of the display.

If the store is remote, you must first dial up the remote store using the main menu selection **Dial A Remote Store**. When you have connected to the remote store, you can then start the cutting test data collection procedure. **Intelli-Net** will then collect the data, store the data in a disk file, and print the cutting test if printing is requested.

An example cutting test report is shown below.

--- ---

01-14-97 TOLEDO SCALE
09:37:00 CUTTING TEST REPORT
SCALE ADDRESS: 20

SCALE I.D. #: 06
PRODUCT NUMBER: 000140
PRODUCT WEIGHT: 101.50

TEST START DATE: 01-17-97
TEST START TIME: 08:31
TEST END DATE: 01-17-97
TEST END TIME: 10:31

DEPT NO	PLU NO	ITEM NO	DESCRIPTION	WEIGHT	% OF TOTAL	UNIT PRICE	TOTAL RETAIL DOLLAR
4	0101	001175	BEEF RIB LARGE END ROAST	41.85	41.23	3.59	150.23

4	0102	001194	BEEF RIB SMALL END STEAK	33.88	33.38	3.89	131.78
4	0103	001717	BEEF CUBE STEAK	3.97	3.91	2.89	11.47
4	2997	002997	TRIMMINGS	2.00	1.97	1.29	2.58
			SALEABLE YIELD:	81.70	80.49		
4	2998	002998	BONE	4.00	3.94	0.00	0.00
4	2999	002999	FAT	8.00	7.88	0.00	0.00
			CUT LOSS/SHRINK:	7.80	7.68		
			TOTAL:	101.50			296.06

COST:		GROSS MARGIN:	
TOTAL INVOICED COST $:	193.50	TOTAL $:	102.56
INVOICED COST PER LB:	1.91	PROFIT PER LB:	1.01
SALEABLE YIELD COST/LB:	2.37	TOTAL G.GM %:	34.64

Collect/Print Case Pulls Report

When the Case Pulls Report function is selected, **Intelli-Net** will collect data from a type-4 master scale then print a report based on the collected data from stored case pull data collected from an 8305M scale. The master scale must either be an 8305M, or if the master is an 8422M/8423M, it must have at least one model 8305 satellite prepack scale on the master/satellite network to generate a case pull report.

To generate the case pulls report, select **Collect/Print Case Pulls Report** from the Print Reports Menu. You must then type in the scale address of the master scale. Next you must type in the Scale I.D. of the 8305 satellite that will be polled for the data. The Scale I.D. is the number the master scale uses to identify a satellite on the master/satellite network. This number should not be confused with the scale address the host uses to identify a scale on the **Intelli-Net** network. The Scale I.D. can be displayed on the model 8305 scale by pressing the **F7 Display Scale ID** key on the front panel of the scale. Once these numbers are entered, you will be asked if a report should be printed once the data has been collected.

An example report is shown below.

01-17-97 METTLER TOLEDO
09:37:00 CASE PULL REPORT
SCALE ADDRESS: 20

SCALE ADDRESS: 20
SCALE I.D. #: 06

DEPT NO	PLU NO	ITEM NO	DESCRIPTION		PKG PRICE	MOD	TOTAL CODE	TOTAL PKG	DOLLARS
0	0021	001021	BEEF CHUCK	CHUCK STEAK THIN CUT	2.19	1	0	3	10.03
0	0030	001064	FRESH GROUND CHUCK	GROUND FRESH DAILY	1.49	1	0	5	14.90
				TOTALS:				8	24.93

Print Future Activation Master Listing

This function will print a full listing of all the Future Activation Files.

Dial a Remote Store

The main menu selection, **Dial A Remote Store** is used to connect with a remote store via modem. Once a successful connection has been made, **Intelli-Net** will return to the main menu allowing you to perform various functions while the remote store is on-line.

Make sure the modem is powered up and ready to use. If you are using a data switch to select a modem or other device, set the switch to the modem position before selecting the dial function. If your modem is on a dedicated port or is an internal modem, the **Intelli-Net** store configuration should already be configured for the correct port and baud rate.

To start the dialing sequence, select **Dial A Remote Store** from the main menu. You will next be asked to select which store number (2-9999), as shown in Figure 4.12.1.

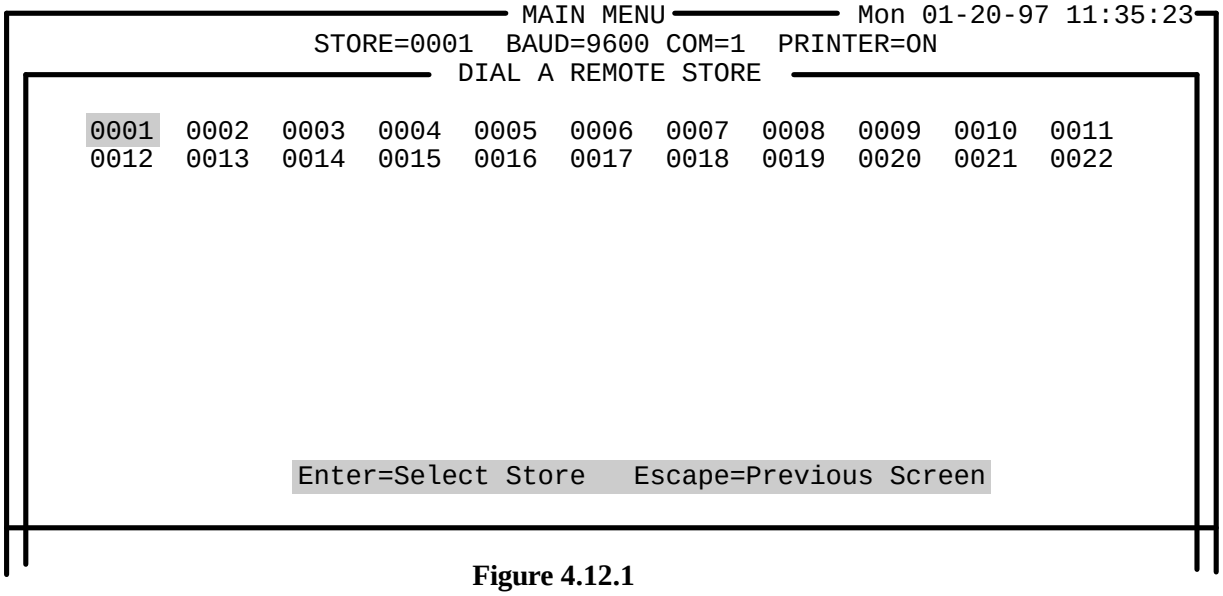


Figure 4.12.1

Select the store by highlighting the store number and pressing **ENTER**. (Note: The store number is the number you used to identify the remote store when you first configured the store. Do not confuse the store number with the data phone number which is the modem telephone number you entered in the store configuration.)

To collect production totals for a remote store, use the main menu selection "collect production data", which will automatically dial the remote store and collect the totals data, then hang up and return to the local mode.

You will next see a message indicating that **Intelli-Net** has started the dialing sequence. If an error occurs, a message will display indicating a problem with the modem or telephone line. You should first check the status of the modem or phone line before attempting another dialing session.

If the remote store's modem does not answer, or if a busy signal is detected, **Intelli-Net** will attempt to connect to the store two more times. If the remote store does not answer after the third attempt, a message indicating a communication error has occurred. You can press any key to return to the main menu. You can repeat the sequence again after correcting the problem.

When a successful connection has been made, you will be automatically returned to the main menu. At this time you can perform various functions just as if the remote store was a local scale network. The main menu status line at the top of the screen will show the currently connected store number, baud rate, and com port. To disconnect from the remote store and return to local mode, select **DISCONNECT MODEM <F10>** on the main menu which will be displayed when you are connected to remote stores. You can also dial another remote store by repeating this procedure and entering another remote store number.

Setup Autodial Session

The main menu function, **Setup Autodial Session**, allows you to setup or run an unattended automatic dialing session that can upload or download data automatically to selected stores. A macro recorder can record keystrokes that can be used later to repeat frequent operations.

Setup Download Autodial Session

The function **SETUP DOWNLOAD AUTODIAL SESSION** can be used to connect to selected stores, update the PC's master file and scales with selected pending files, and collect/print production totals from all or selected departments (optional). This function can be used for both local and remote stores if you are using separate com ports for the local store scale network and a modem. The autodial session can be programmed to start immediately or at a later time or date. (Note: If the PC has been programmed to start a session at a later time/date no other tasks can be performed until the session is completed or aborted.) A macro recorder can record keystrokes that can be used later to setup and run the session automatically.

To setup or run a download autodial session, select the main menu function **Setup Autodial Session**. The Autodial Session Menu will be shown as in Figure 4.13.1. **Setup Download Autodial Sessions** can be used to manually setup the PC in an autodial download session mode, or to record a macro which can be run later using **Run Autodial Sessions**.

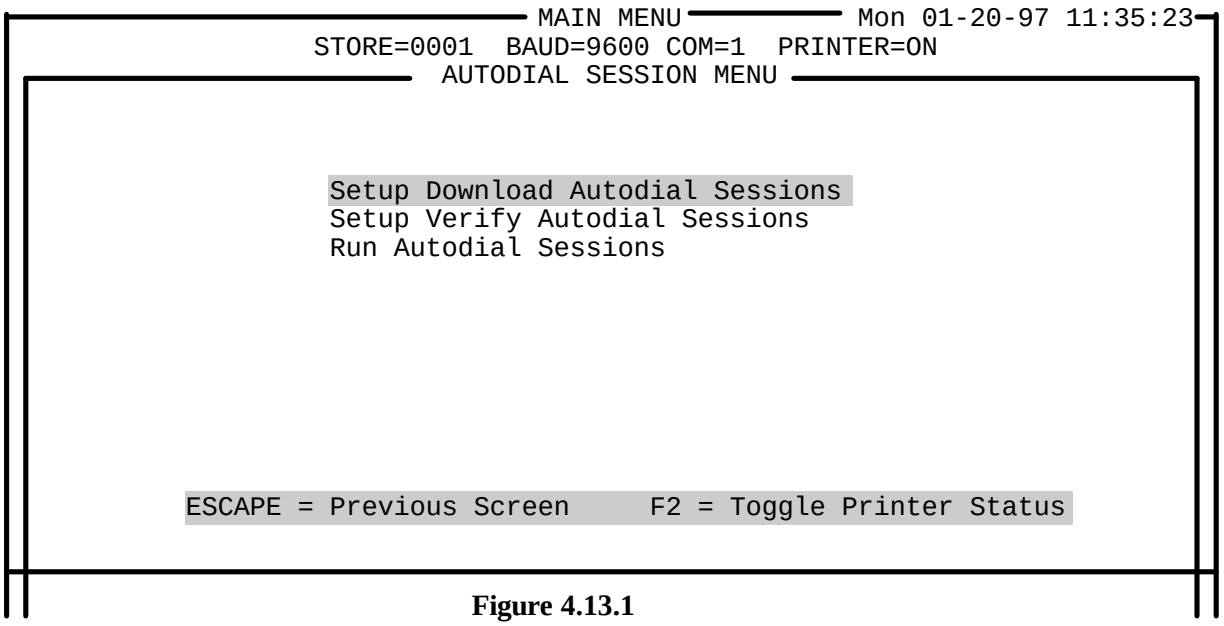


Figure 4.13.1

Select **Setup Download Autodial Sessions** on the Autodial Session Menu, as shown in Figure 4.13.2. You will be asked "**Record Data For Autodial Script File (Y/N):** ". Answering **Y** will allow you to record all of the keystrokes used in this session. This information will be stored in a script file which can then be used to automatically start an autodial session that may be run frequently. Using a script file will eliminate the time keying in the same keystrokes to run a standard routine. If you answer **N**, the session will not be recorded. You can then setup the autodial session without recording a script. If record data for script file is selected, you will be prompted to enter a script file name.

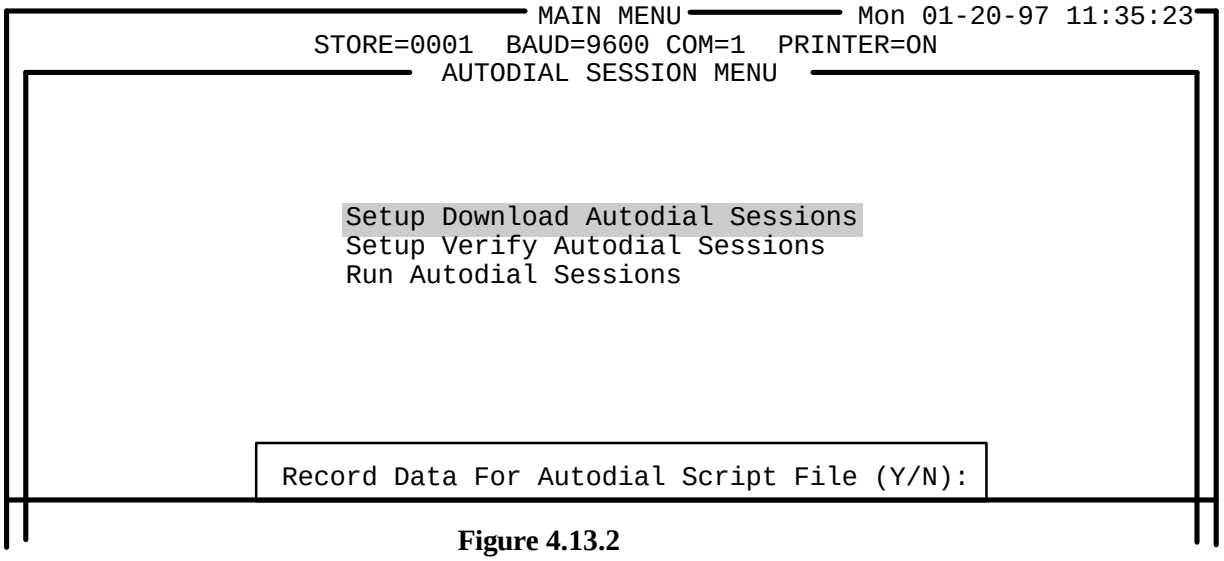


Figure 4.13.2

Pending files will be sent in the order selected.

Figure 4.13.3 shows the **START AUTODIAL SESSION** screen which will next be displayed. If you will be recording the session, **Recording Script** will be displayed in the upper left corner of the autodial session window.

The screen will list all pending files that currently exist. Each pending file is shown with a department code (A-O), the pending file name, and the pending file type (R, S, X, E, A, N, G). Select one or more pending files by using the cursor keys to highlight the file, then press the **ENTER** key. All selected pending files will remain highlighted. To de-select a pending file, use the cursor keys to move to a highlighted file, then press **<F2>**. You can select individual pending files by highlighting the pending file name, then pressing **ENTER** for each file you wish to copy, or press **<F7>** to select all of the listed pending files. Press **ESC** to continue when you are finished selecting pending files.

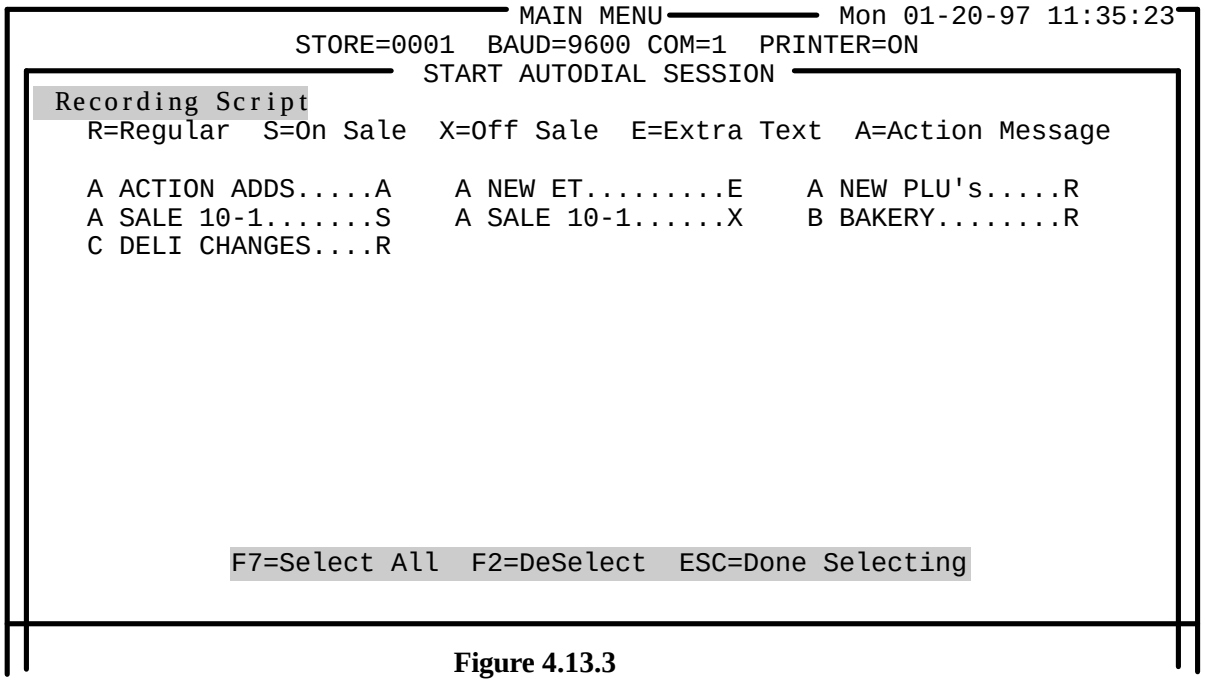
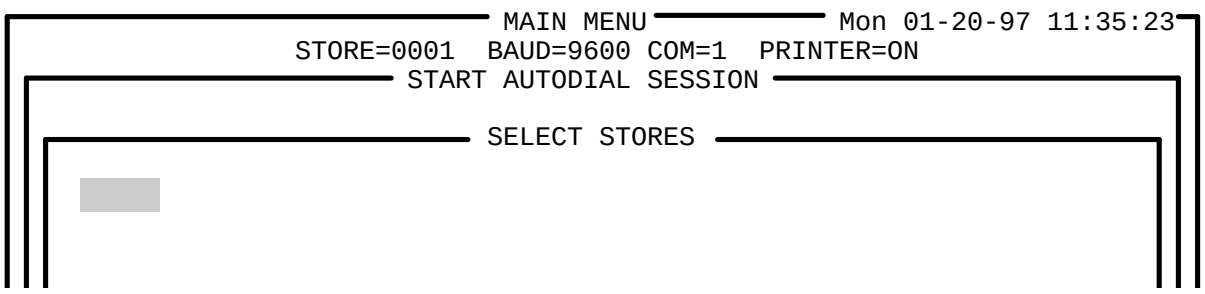


Figure 4.13.3

When you have completed selecting pending files for the session, you will next select the stores you wish to be updated, as shown in Figure 4.13.4. This screen will list all stores configured in **Intelli-Net**. Select the stores by using the cursor left/right keys to highlight the desired stores, and press **ENTER** on a highlighted store to select the store. Selected stores will remain highlighted. Press **<F2>** to de-select a store. All listed stores can be selected by pressing **<F7>**. When you are finished selecting stores, press **ESC**.



```
0001  0002  0003  0004  0005  0006  0007  0008  0009  0010  0011
0012  0013  0014  0015  0016  0017  0018  0019  0020  0022  0023







F7=Select All Stores   F2=DeSelect Store   ESC=All Done
```

Figure 4.13.4

After you press **ESC**, you will next be asked "**Update Database (Y/N)**" and next "**Collect Active Accumulator Data (Y/N):**". Press **Y** to collect production totals (accumulators) while **Intelli-Net** is on-line with the stores. Press **N** if you do not wish to collect production totals. If you answer **Y** to collect accumulator data, you will be asked four more questions:

Clear The Accumulators In The Scales (Y/N):

Enter Production Report Prefix (Default = "ACC"): ...

Print Reports After Collecting Data (Y/N):

Convert Data to Lotus format after Collecting (Y/N):

If "YES" is selected refer to the following sections:

- Print Action Message Listing
- Collect/Print Cutting Tests Report

Press **Y** if you want to clear (reset to zero) the accumulators after the data has been collected, or press **N** if you do not want the accumulators cleared for the first question. Press **Y** for the second question if you want reports printed after the data has been collected. If you want reports printed, you will be asked to first select the preconfigured report you wish printed and if you want the report generated for all or selected stores. You will then be asked if you wish to convert the data to Lotus format after collecting. If you answer **Y** (Yes), you will be prompted to enter an export file name. The Intelli-Net will prompt you for the following information:

Collect Obsolete Accumulator Data (Y/N):

Collect Case Pull Data (Y/N):

Collect Cutting Test Data (Y/N):

The next and the final step is to supply the time and date for the autodial session to begin, as shown in Figure 4.13.5. If you would like to run the autodial session immediately press <**F10**>.

```
MAIN MENU                    Mon 01-20-97 11:35:23
STORE=0001  BAUD=9600 COM=1  PRINTER=ON
START AUTODIAL SESSION
ENTER TIME AND DATE FOR AUTODIAL

Enter Date (MM-DD-YY): ........
```

```
Enter Time (HH:MM - 24 Hour Format): .....


ESC = Abort  F8 = Current Date
F10 = Current Time & Date
```

Figure 4.13.5

After entering the time and date, you will be asked if you wish to **EXIT TO DOS** on completion. Entering **Y** (Yes) will cause Intelli-Net to terminate its execution after completing all autodial functions requested.

If you wish to start the autodial download session immediately, just press **ENTER** without typing in the date or time at the prompts. The current date or time will be entered, and the session will begin. If you wish to start the session at a later date or time, first type in the desired date in the format **MM-DD-YY** (example: 10-19-90) then press **ENTER**. Next type in the desired time in a 24-hour format (example: 2:00 A.M. would be typed in as 02:00, and 2:00 P.M. would be typed in as 14:00), then press **ENTER**. When asked "**Is Everything OK (Y/N)**", press **Y** to continue, or **N** to re-enter the date/time, or **ESC** will abort the session completely.

Once Intelli-Net is in the wait state, no other functions can be performed on the PC until the autodial session is completed.

If you pressed **Y** to continue, the message "**Waiting....**" will be displayed indicating the session is in a wait state until the date and time match the current time to start the dialing session. Once the dialing session begins, you will see various status messages indicating what function is taking place. When all programmed functions are completed, **Intelli-Net** will return to the main menu.

Throughout the autodial session, a status log will be written to a disk file called LOG.DAT that will record programmed events and any errors that may have occurred in the session. This log can be printed or viewed after the session has ended by selecting the main menu function, **Miscellaneous Functions**, then selecting **Print/View Log File** from the Miscellaneous Functions Menu. By examining this report, you can determine if all scheduled functions were performed in the autodial session.

If the log shows a scale failed to communicate and did not receive the pending file, or if the PC failed to connect with a remote store, you can post the pending file manually using the main menu function, **Dial A Remote Store**, after the problem has been corrected. After you have verified that all stores and scales have been updated, the pending files may be erased if they are no longer needed.

If you recorded a script file for this autodial session, you can automatically setup the next session by selecting **Run Autodial Sessions** then selecting the session to run.

Setup Verify Autodial Session

The **SETUP VERIFY AUTODIAL SESSION** allows an unattended verify of a scale PLU file from local or remote stores.

You will be asked "**Record Data For Autodial Script File (Y/N): "**. Answering **Y** will allow you to record all of the keystrokes used in this session. This information will be stored in a script file which can then be used to automatically start an autodial session that may be run frequently. Using a script file will eliminate the time keying in the same keystrokes to run a standard routine. If you answer **N**, the session will not be recorded. You can then setup the autodial session without recording a script. If record data for script file is selected, you will be prompted to enter a script file name.

The program will prompt for the following information:

Enter Scale Address: ..

"Select Stores"

"Select Departments to Verify"

"**Is Everything OK (Y/N):"**

"Verify Future Activation Records (Y/N):"

"Enter Date and Time for Autodial"

"Exit to DOS on completion?"

Run Autodial Sessions

Selecting **Run Autodial Sessions** (Refer to Figure 4.13.6) will allow you to select and run previously recorded script files. By running the selected script file, Intelli-Net will automatically key the exact keystrokes you entered from a previous autodial session. By using this function, frequent standard session can be quickly setup simply by selecting the script name.

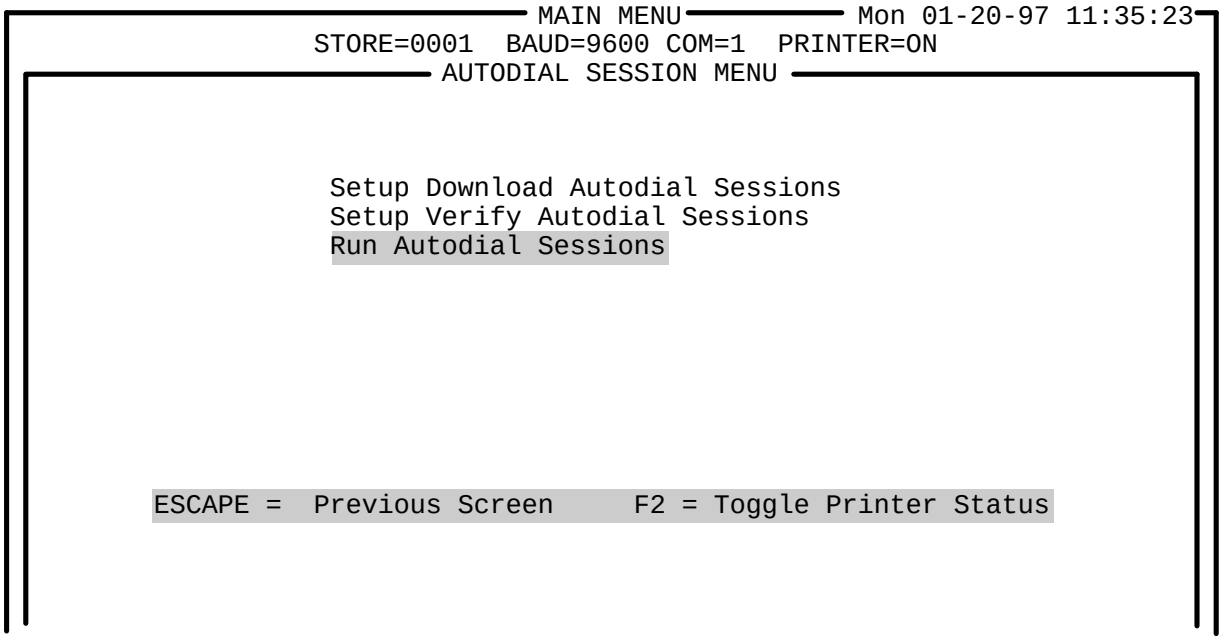


Figure 4.13.6

Figure 4.13.7 shows the screen to select the script file to run. These script files are created by memorizing keystrokes from a previous autodial session when answering **Y** to record data for script file (Refer to 4.13.1). To select and run a script file, highlight the file name, then press **ENTER**. The sequence number will appear to the left of the script file selected. Repeat until all script files required to run have been selected. Press **ESC** key when done. The script file will automatically execute the files in the order that is prioritized. You will be able to see the functions on the screen as they are performed.

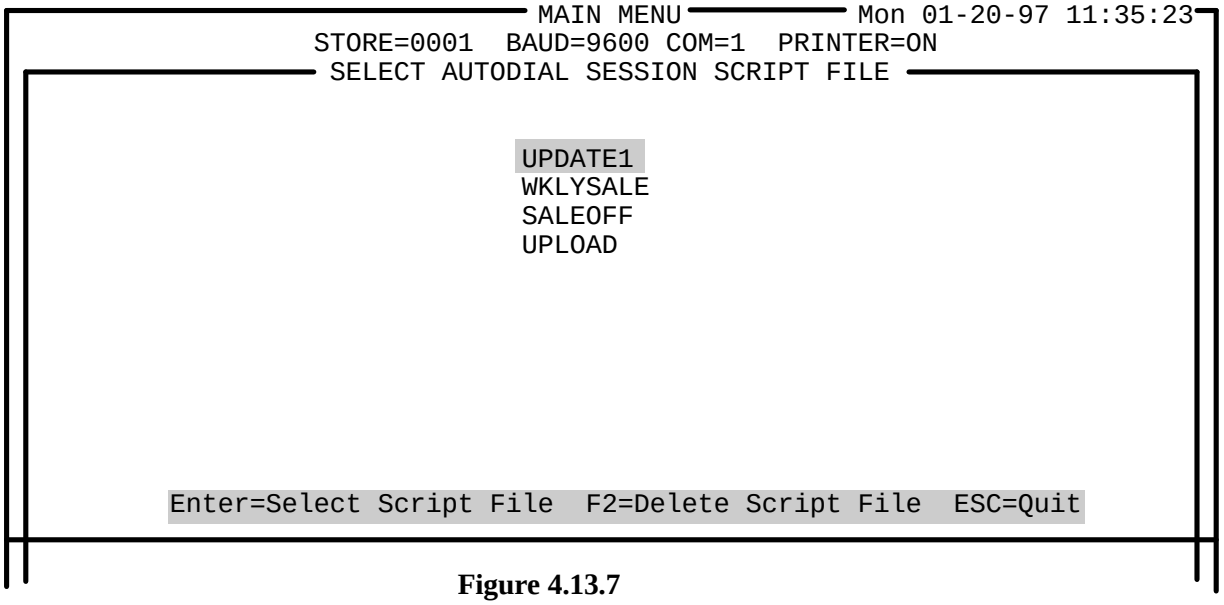


Figure 4.13.7

Transfer all Files to Master Scale

If transfer grade table is selected, you will be asked to select a grade zone: Enter a number from 1 to 99.

The main menu function, **Transfer All Files To Master Scale**, can be used to send selected master files to **TYPE-4, TYPE-6, AND TYPE-9 MASTER SCALES** (only), overwriting any existing files in the master scale. This function can be used when adding a new scale to a system, or to update an existing file in a master scale that is suspected of not matching the master file in **Intelli-Net**. The **Transfer All Files To Master Scale** screen is shown in Figure 4.14.1. The screen is shown with scale 20 selected, and the PLU Master File and Extra Text File have been selected for transfer. The lower part of the screen shows the transfer status.

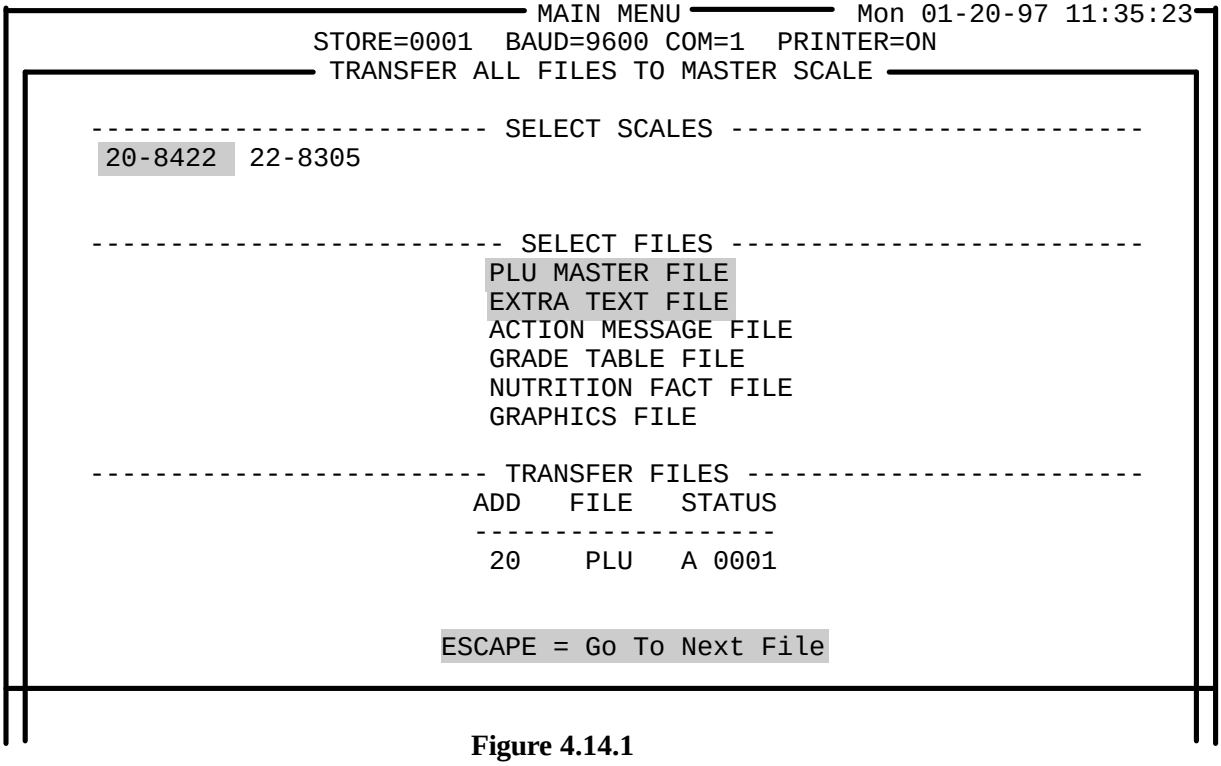

MAIN MENU
Mon 01-20-97 11:35:23
STORE=0001 BAUD=9600 COM=1 PRINTER=ON
TRANSFER ALL FILES TO MASTER SCALE
SELECT SCALES
20-8422 22-8305
SELECT FILES
PLU MASTER FILE
EXTRA TEXT FILE
ACTION MESSAGE FILE
GRADE TABLE FILE
NUTRITION FACT FILE
GRAPHICS FILE
TRANSFER FILES
ADD FILE STATUS
20 PLU A 0001
ESCAPE = Go To Next File

Figure 4.14.1

Extra Text Maintenance

Figure 4.15.1 shows the Extra Text Maintenance Menu.

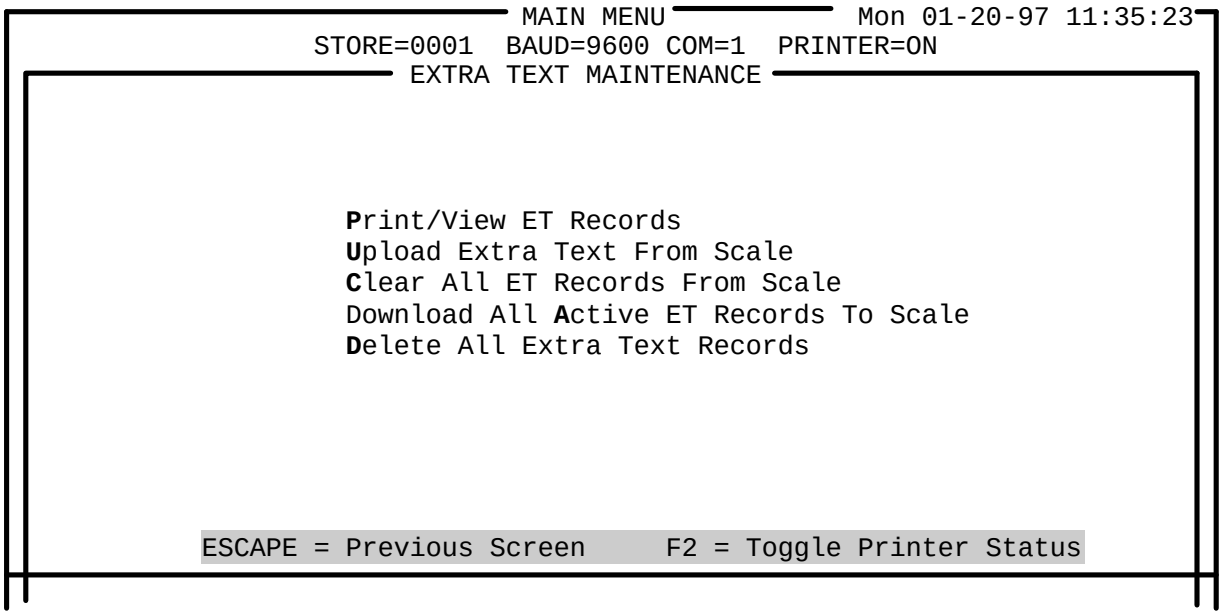


Figure 4.15.1

Print/View ET Records

Print Full Extra Text Listing

Print Full Extra Text Listing will print the full text record, plus text format information on the PC's printer.

Print 5 Line Extra Text Listing

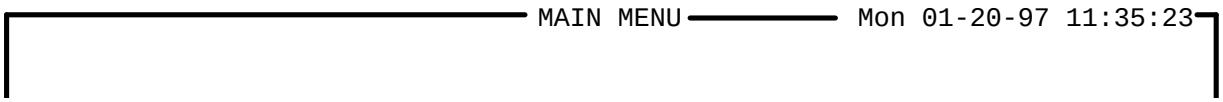
If less detail is required to identify an extra text record, this selection will print the extra text code plus the first 5 lines of the record on the PC's printer.

Print Individual Extra Text Records

This selection will print the complete text record only for selected records.

View Extra Text Records

The extra text can be viewed by selecting **View Individual Extra Text Records**. You will first be asked to enter the number of the record to view. Once the record is displayed, use the cursor up/down keys to scroll if the record is longer than the window. You can view the next record in numerical order by pressing **PageDown**, or the previous record by pressing **PageUp**. Press **ESC** to exit from the view screen and return to the menu. You can enter an existing ET record number to display a desired record. An example view screen is shown in Figure 4.15.2.



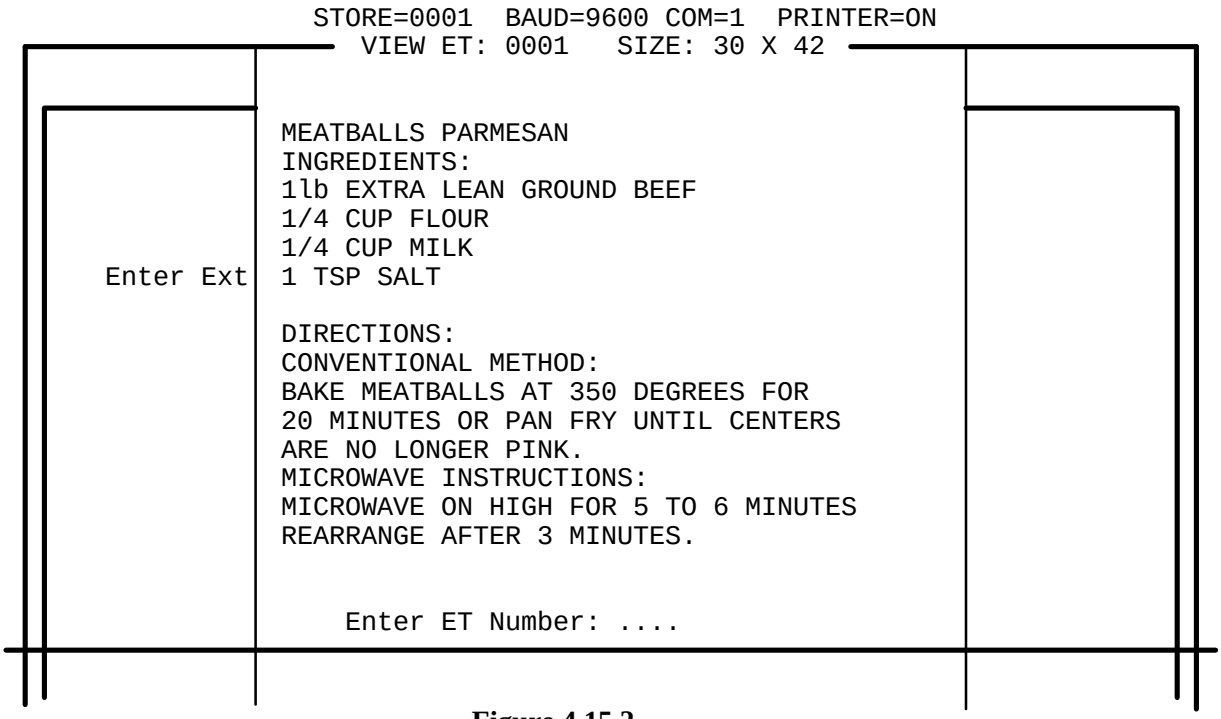


Figure 4.15.2

Print All Non-Active ET Records

All extra text records that are not currently assigned to a PLU record can be printed out using this function. This list can then be used to delete unused records.

Upload Extra Text From Scale

When uploading a file from a 350 printer, the extra text code will be the same as the PLU number. In the 350, the extra text is part of the PLU record. Other scale types can use a separate extra text number to link the extra text record to the PLU record.

An existing extra text file in a scale can be uploaded into **Intelli-Net** to create a new master extra text file, or if a master file currently exists in **Intelli-Net**, new extra text records can be added to the master extra text file. When using the upload function, if a scale extra text record is uploaded using the same extra text code as an existing record in **Intelli-Net**, the duplicate record will be discarded. If the scale's extra text code does not match any existing record numbers, the extra text will be added to the master extra text file.

When starting the upload procedure, you will be asked to type in the scale address number, and select the label format to use for the uploaded records, as shown in Figure 4.15.3.

Before starting the upload, you will be asked if you wish the program to stop on duplicate extra text (an extra text number that already exists in the data base). If **Y** (Yes) is answered and a duplicate extra text is uploaded, you can select from one of three choices:

- Give the uploaded extra text a new number that does not exist in the database
- Overwrite the existing extra text with the uploaded extra text

- Do nothing (ignore the uploaded extra text).

If **N** (No) is entered, you will be asked if you wish to automatically overwrite any duplicate extra text records.

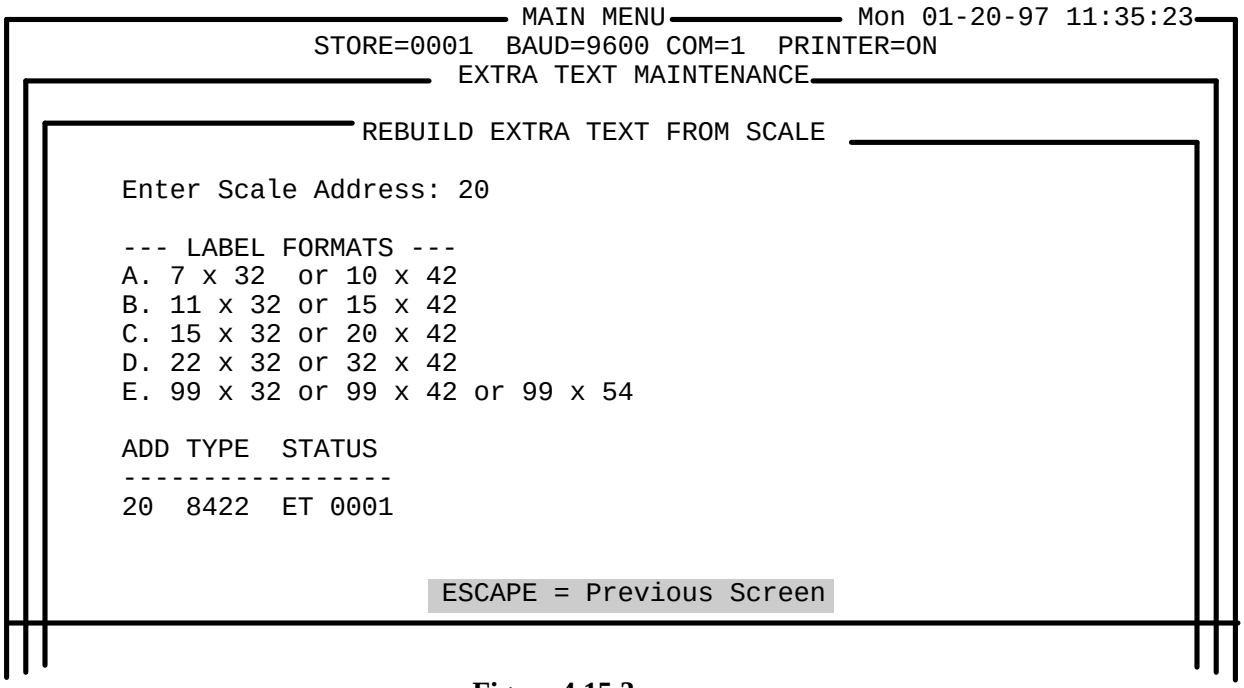


Figure 4.15.3

During the upload procedure, the status of uploaded records will be printed on the PC's printer showing if the record already exists, if it was added to an unused number, or if the number of lines in a record exceeds the maximum number of lines for the label format selected. If the record contains more lines than the format selected, **Intelli-Net** will automatically select a format compatible with the upload text record. After the upload, these records can be edited to modify the label format if needed. During the upload, a status report will be printed (or sent to the log file) showing if a duplicate record already exists, whether it was added, or if the format needed to be changed. An example status report is shown in Figure 4.15.4.

```
01-17-97          METTLER-TOLEDO                    PAGE 1
11:00:21          COLLECTING SCALE DATA
                  ADDRESS:20 TYPE:8422

ADD ET#  DESCRIPTION

 20 0001 Already Exists
 20 0002 Already Exists
 20 0003 Added
 20 0004 Already Exists
 20 0005 Lines Per Label Increased To 30
```

Figure 4.15.4

When the upload is complete, the screen will return to the Extra Text Maintenance Menu. The printed log of the upload procedure should be examined for any error messages during the upload.

Clear All ET Records From Scale

To clear an existing extra text file in a master scale, the ET Menu function **Clear All ET Records From Scale** can be used. This function will not affect the PLU master file in the scale.

Download All Active ET Records To Scale

Active Extra Text records are defined as existing extra text that is linked to a PLU record. To quickly download only active records to a scale, the Extra Text Menu Function, **Download All Active ET Records To Scale,** can be used. If the scale currently contains an extra text file, it can be deleted using the ET menu function, **Clear All ET Records From Scale**, before the new file is sent. When this function is selected, the PLU master file is searched for PLU records that contain extra text code entries. A status line on the screen will display the records and the extra text codes that will be downloaded to the scale.

Delete All Extra Text Records

Caution! This selection will delete all extra text records from the Intelli-Net database.

To delete all Extra Text Records, select **Delete Existing Extra Text Records** from the Extra Text Maintenance Menu as shown in Figure 4.15.5. Enter the Extra Text Code of the record you wish to delete, as shown in Figure 4.15.5. To delete all the extra text records press **<F7>** key.

If needed, all extra text records can be deleted from the database by using this selection. You must be logged in with the Master Password in order to access this function, if passwords are enabled.

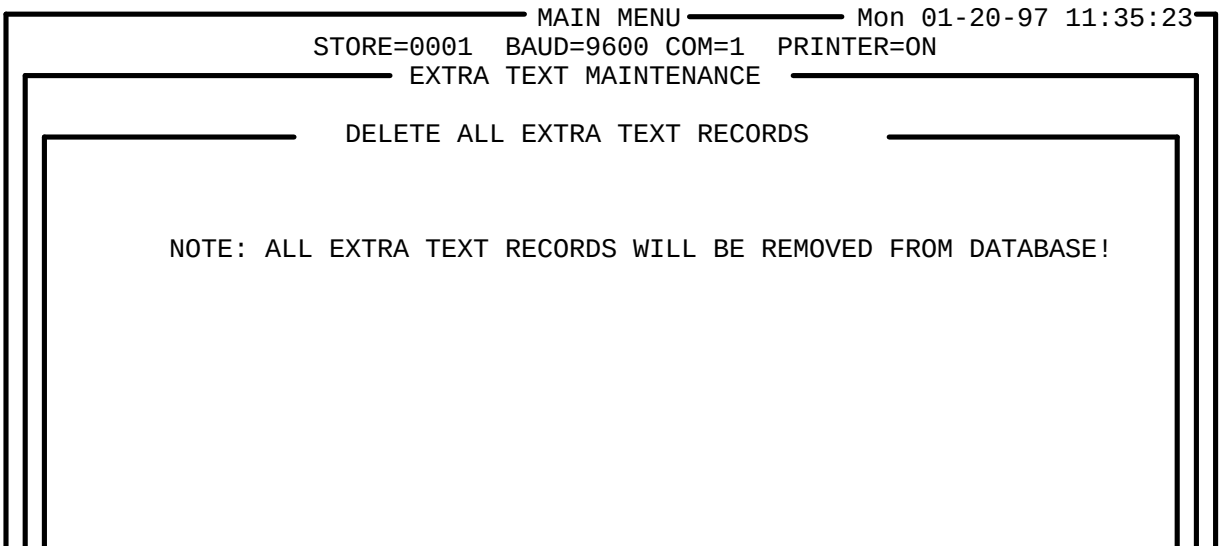


Figure 4.15.5

Press **Y** to confirm deletion all of records.

Action Message Maintenance

The Action Message file corresponds to the Action Code Table in **Type 4** 8422M/8423M/8305M scales, **Type 9** 8460M scales, and the 8427SA/8423SA stand alone scales. The action message file can consist of up to fifty 63-character messages. These messages can be assigned to PLU records to print on the store address line in place of the programmed store address, or used for scrolling marquee messages on the scale's display.

The Action Message Maintenance Menu is shown in Figure 4.16.1.

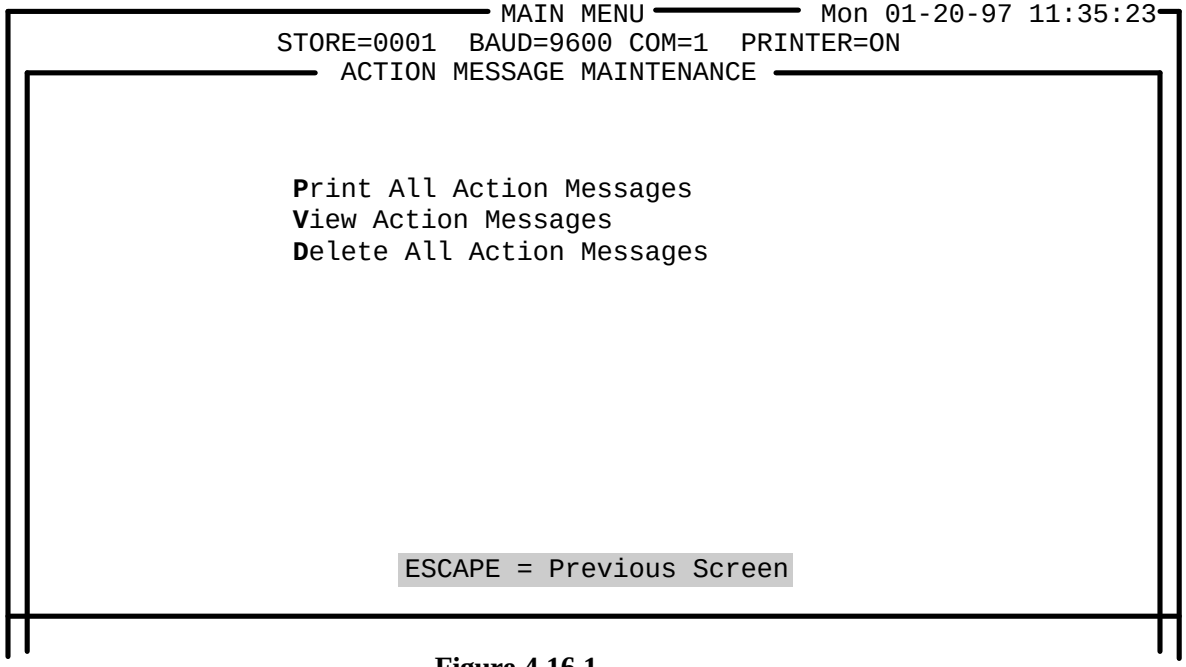


Figure 4.16.1

Print All Action Messages

The selection, **Print All Action Messages** will print a listing of all action messages that have been created in **Intelli-Net**.

View Action Messages

This selection will allow viewing of all action messages in the master action message file. An example screen is shown in Figure 4.16.2. The cursor up/down keys can be used to scroll through the messages if there are more than will fit on the screen. Press **ESC** when you are finished viewing the action messages.

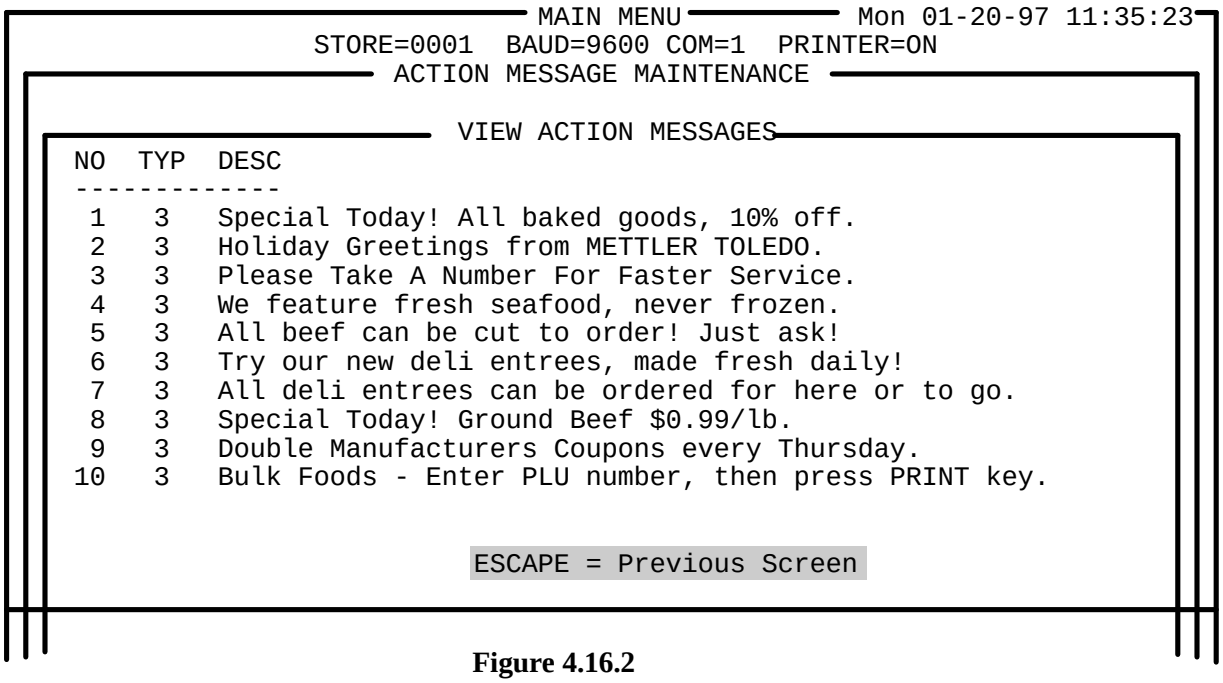


Figure 4.16.2

Delete All Action Messages

This selection will delete all action messages!

Add/Modify/Delete Grade Table Records

The grade table in type 4, and type 9 scales can be maintained using Intelli-Net. Up to 20 different grade tables of 16 grades can be maintained. To add, modify, or delete grades, select **Add/Modify/Delete Grade Table Records** from the Grade Table Maintenance menu, as shown in Figure 4.17.1.

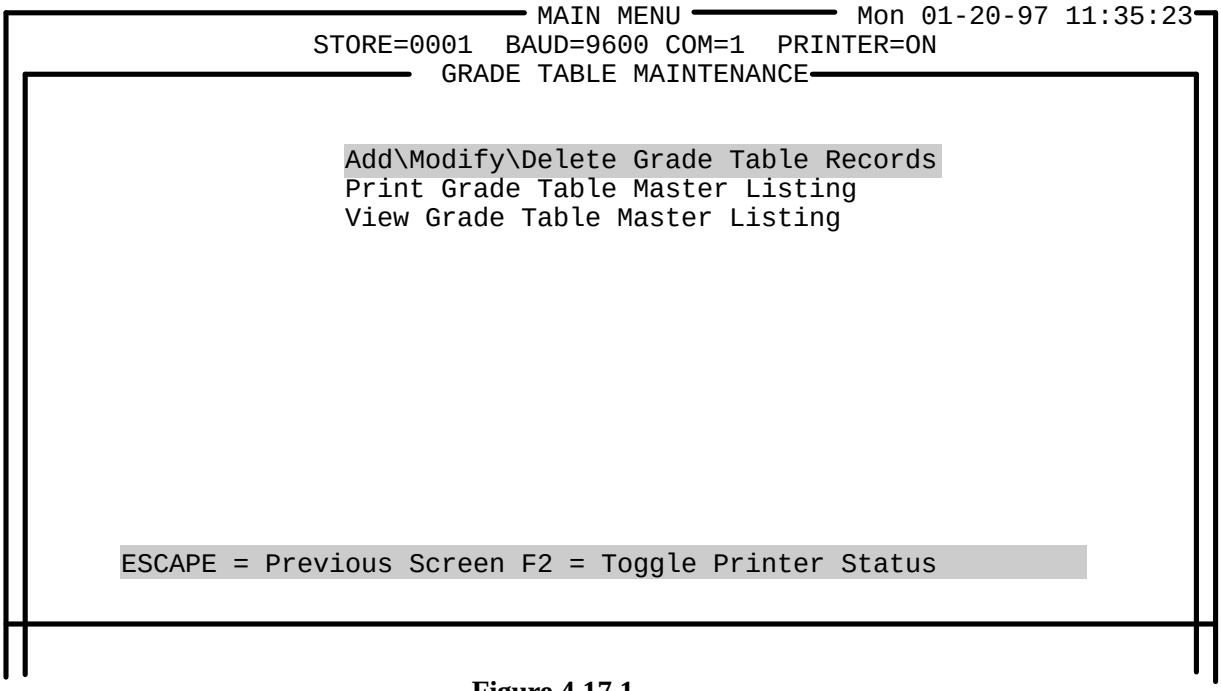


Figure 4.17.1

First enter a grade zone. You can then enter the grade to add, modify, or delete, as shown in Figure 4.17.2. If a grade is currently programmed, the **Desc** field will shown current grade descriptions. To delete a current grade, enter the grade number, press **ENTER**, then press **<F2>**.

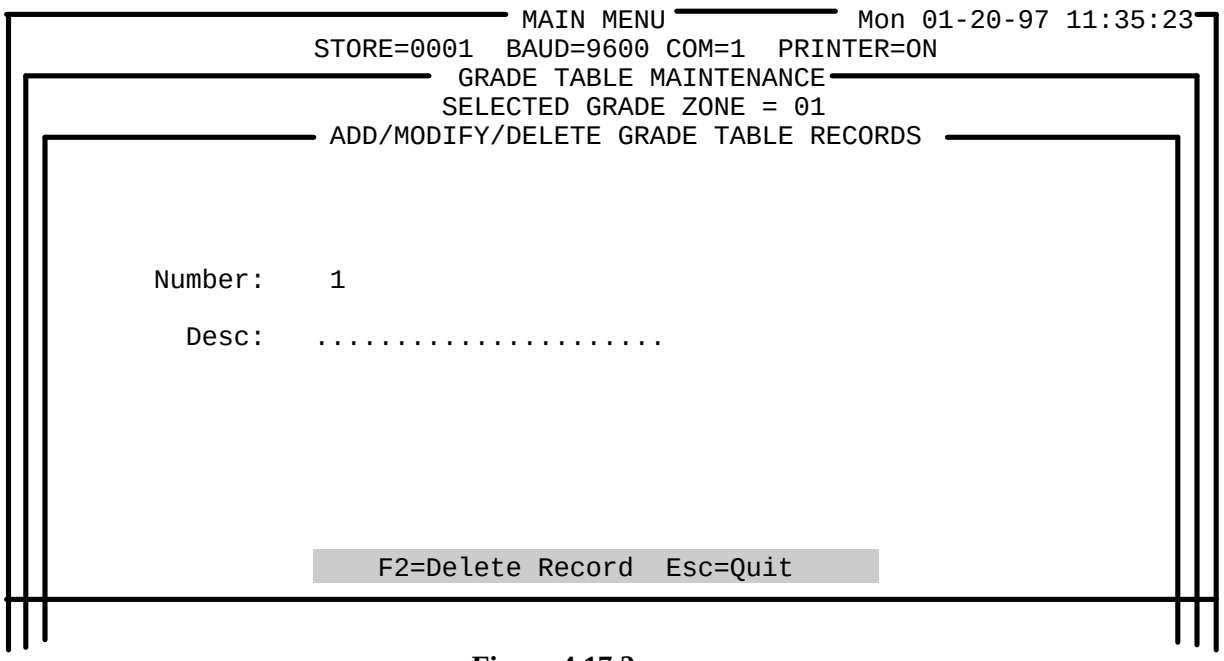


Figure 4.17.2

Print Grade Table Master Listing

A printout of the grade table master listing by zone can be obtained using this selection

View Grade Table Master Listing

To view each grade table by zone, use this function

Nutrition Fact Maintenance

View Nutrition Fact Records

View Nutrition Fact Records is the first option on the **Nutrition Fact Maintenance** Menu, as shown in Figure 4.18.1. When selected, it will prompt you for a Nutrition Record Number. After entering the number, a screen much like the Nutrition Facts Editing Screen, discussed in Section 4.6.1.7, will appear. The information stored for the selected Nutrition Record Number will be displayed. It can not be edited here; that must be done from the Pending File Maintenance Menu. The **Page Up** and **Page Down** keys can be used to view the entire record. The **End** key will take you back to the **Nutrition Fact Maintenance** Menu.

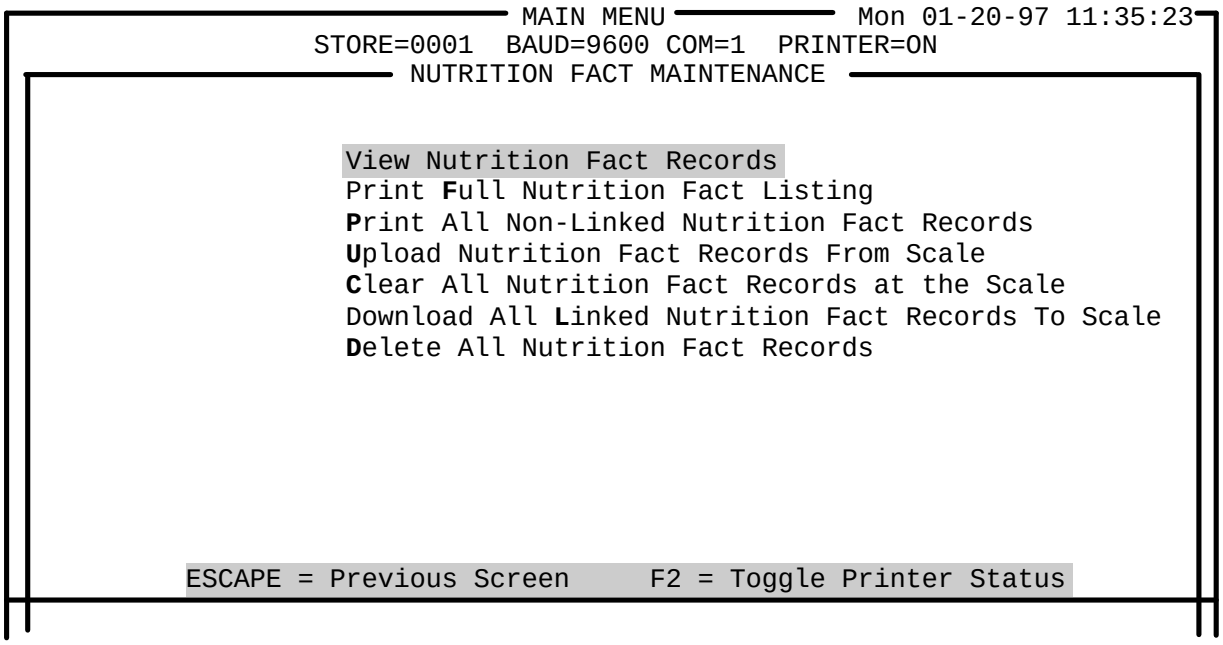


Figure 4.18.1

Print Full Nutrition Fact Listing

When this function is selected, you will be prompted for the range of nutrition fact records (from the master file) you wish to print. This can be any number of records, select one or all of them. It will then print the selected range, provided the printer is toggled on.

Print All Non-Linked Nutrition Fact Records

This function prints a listing of all non-linked (not attached to a PLU number) nutrition fact record numbers found in the master file. This list can be used to delete unused records.

Upload Nutrition Fact Records From Scale

When this function is selected, the next screen will prompt for a scale address from which to upload the nutrition facts records. If the address given does not correspond to a type 9 scale, or to a type 4 scale which has been upgraded for nutrition facts, an error message will abort the function. If the address given is acceptable, the nutrition facts will then be uploaded to the master File.

Existing nutrition fact records in the master file will not be overwritten by the records uploaded from the scale.

Clear All Nutrition Fact Records at the Scale

When this function is selected, the next screen will prompt for a scale address, then for confirmation ("Are You Sure (Y/N)?"). All the nutrition fact records in that scale's memory will be deleted. The function will be aborted, however, if the scale selected is not a type 9 scale, or a type 4 scale which has been upgraded for nutrition facts records.

Download All Linked Nutrition Fact Records To Scale

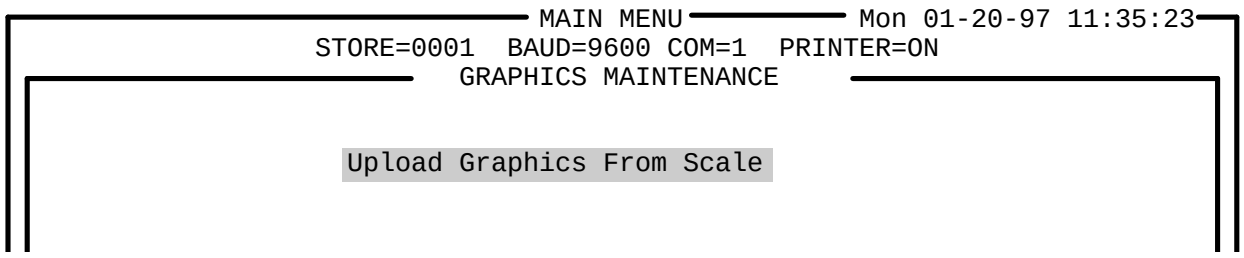
This function will prompt for a scale address, then it will download all linked nutrition fact records from the master file to that scale, provided that the scale is on-line and it is able to support nutrition fact records.

Delete All Nutrition Fact Records

This function will delete all the nutrition fact records from the master file. You will be prompted for confirmation - "Are You Sure (Y/N)?" before this is completed.

Graphics Maintenance

Upload Graphics From Scale is the first selection on the **Graphics Maintenance Menu**, shown in Figure 4.19.1. Once this function is selected, the next screen will prompt for a scale address from which the graphic records are to be uploaded. If this address does not correspond to a type 9 scale, an error message will abort the function. If it does, the Graphics records from the scale will be uploaded to the master file. Existing graphic records in the master file will not be overwritten by the records uploaded from the scale.



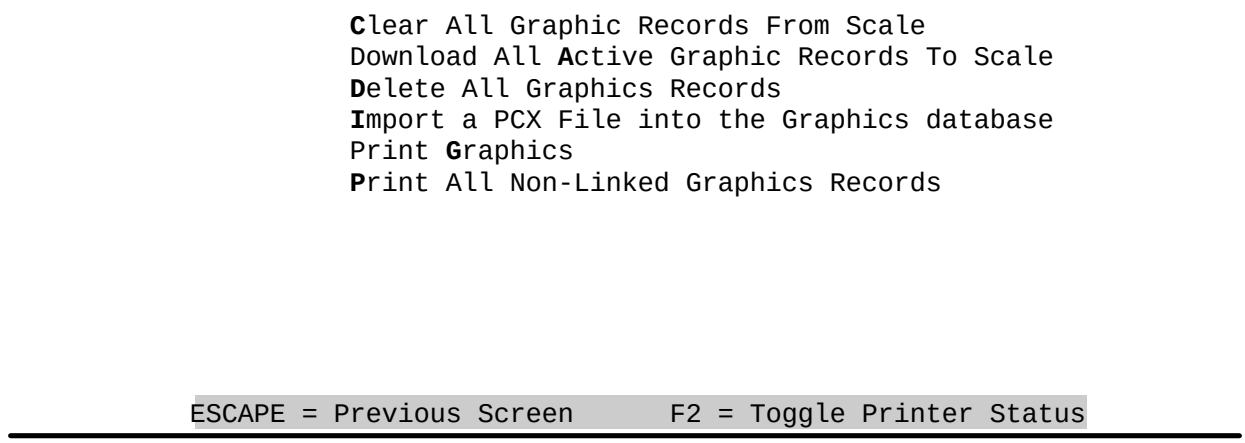


Figure 4.19.1

Clear All Graphic Records From Scale

This function will first prompt for a scale address. If the address given corresponds to a type 9 scale, you will be prompted for confirmation before all the graphics records are deleted from that scale.

Download All Active Graphic Records To Scale

This function is important if the Intelli-Net has a lot of graphics that are not used in the scale to reduce the memory required in the scale

This function will prompt for a scale address. Providing the address given corresponds to a type 9 scale, all active graphic records will then be downloaded from the master file to that scale.

Delete All Graphic Records

This function will delete all Graphic Records from the master file. You will be prompted for confirmation before it deletes them.

Import a PCX File into the Graphics database

This function will load in the graphic (from a pcx file), and assign it a graphic record number and name. It is described in more detail in the section of Creating a Graphics Pending File.

Print Graphics

This function will print a list of all the graphics record numbers in the master file. This list can be used to delete unused records.

Print All Non-Linked Graphics Records

This function will print a list of all the non-linked (those not associated with at least one PLU) graphics record numbers in the master file.

Error Messages

Logs of system events or malfunctions will be sent to the PC's report printer, or to the disk file **LOG.DAT** if the printer is toggled **OFF**. If the printer is toggled to **ON** (the default state whenever **Intelli-Net** is first started), it is important that the printer is operable whenever **Intelli-Net** is in use.

In the event of a malfunction, **Intelli-Net** will inform the operator with an error message. There are two potential types of errors:

1. External Input/Output Errors.
2. Internal Turbo Access Errors.

External I/O errors can include: scale communications errors, printer errors, keyboard entry errors, etc. Printer and keyboard entry error messages will be displayed on the monitor, and an audible alarm will "beep" to alert the operator. Errors relating to scale communications will either be displayed on the monitor, or printed in a status log on the report printer. When communicating with scales, the individual scales may report back with an internal scale error letter code.

Internal Turbo Access errors in the **Intelli-Net** program may occur due to a malfunction accessing certain DOS functions or the PC's disk drives. In some cases the error may be fatal and stop program execution. In this case a window will open to alert the operator. The window will be titled "Turbo Access Error", and will display brief information including the error code and the error file name. If this type of error occurs, press the **SHIFT** then the **PRINT SCREEN** keys to record the error or write it down. This will aid in determining the problem. In addition, write down the function you were attempting to perform when the error occurred. When possible, the **Intelli-Net** program will attempt to create an error log file titled **TACCESS.ERR**. This will be a DOS ASCII file that can be viewed on your monitor or printed out on the printer.

Scale Communication Errors

The following error table lists possible errors that may be reported when attempting communication with a scale. These errors will be printed on the status log during scale communication sessions.

ERROR CODE	DESCRIPTION	CORRECTIVE ACTION
A	Unknown command received from host.	Communication Error. Retry operation. If error persists, check communication lines and scales.
B	Invalid message length for command received from host.	Communication Error. Retry operation. If error persists, verify data being sent to scale by printing report. Check communication lines to scale and converter (if used).
BCC	Checksum error	Reconfigure checksum setup.
C	Checksum Error	Communication Error. Retry operation.
D	Invalid character received in field.	The data sent to scale contained characters that were invalid for the type of data that should be in the field. Retry operation. If problem persists, print report to verify data is valid.
E	Item not found in scale PLU file.	The item to be modified/deleted does not exist in the scale. Use VERIFY SCALE DATA function in the Miscellaneous Functions Menu to compare the data in the scale with the data file in the PC. If different, send department PLU file to scale. If the scale is an 8425, SSW #6 MUST BE ON, or this error will be reported.
F	Invalid value for data field.	An invalid entry was made to a PLU data field. Example: A value of zero (0000) cannot be sent in the Item Number field to a master type-4 scale. Check PLU record(s), edit if necessary, resend file to scale.
G	File Overflow/Insufficient Memory.	The scale has reported insufficient memory to continue loading file from Intelli-Net.
H	Internal Scale Error.	Scale memory read/write error. If sending master file, try reinitializing scale, then resend file. 8425 SSW #6 MUST BE ON.
I	Duplicate Linked Record in Scale	An existing extra text, nutrition fact, or graphic record exists in the scale. Resend the record as a modify.
J	Scale is busy.	Scale is performing transaction. Non-multitasking scales (8301C/8423SA/8427SA) must be in idle state (not performing transaction) for host communication. If the scale is a type-4 master, type-6 master, or type-9 master, certain functions may cause "scale busy" error. (Example: editing prices.) Check scale and retry operation.
K	File already exists in scale.	Use verify scale data function to compare scale file with Intelli-Net master file.
S	Scale Busy, sequence error	Scale is performing transaction, or scale type is configured wrong.

Turbo Access Errors

The following table lists the error codes that **Intelli-Net** may report in the event of a malfunction. These errors messages will be displayed on screen, and if possible, listed in a DOS ASCII text file which can be printed out on the PC's printer.

ERROR CODE	DESCRIPTION	CORRECTIVE ACTION
2	File not found.	Program or data file may be missing, or the path is invalid. If using backup/restore functions, the DOS files BACKUP.COM/RESTORE.COM cannot be found. Check path statement in the AUTOEXEC.BAT file.
3	Path not found.	Check path statement in AUTOEXEC.BAT file. There should be a path statement stating the location of the DOS subdirectory.
4	Too many open files.	Insufficient file allocation environment. CONFIG.SYS file must be located in the root directory of the boot-up drive and contain the statement: FILES=30 or higher for Intelli-Net to operate properly. If error persists increase value.
8 1005 (Also Runtime Error 203)	Insufficient Memory	The PC does not have enough free RAM memory available to perform desired task. If Intelli-Net cannot be started, TSR's may have to be disabled before running Intelli-Net. The PC must have a minimum of 640k conventional RAM memory installed (with a minimum of 580k free) to run Intelli-Net. If the error is encountered while running the backup or restore functions, exit Intelli-Net and start up the separate module BACKREST.EXE to perform backup or restore functions. A memory manager such as the DOS 6 EMM386.EXE, or QEMM ™ may be required to free up enough conventional memory to run Intelli-Net and other programs.
15	Invalid drive specified.	Re-enter a valid drive letter.
100	Disk read error.	An error occurred attempting to read a disk file. If attempting to read a floppy disk, the disk may be defective or not formatted. If the error occurred reading the hard disk drive, run DOS CHKDSK /F to check disk for errors. Refer to your DOS manual for details. If the error indicates an index file may be corrupt, run the REBUILD INDEX FILES function on the MISCELLANEOUS FUNCTIONS MENU to repair the index file.
101	Disk write error.	An error occurred attempting to write to disk. If writing to the hard disk, run DOS CHKDSK /F. If writing to a floppy disk, make sure it is formatted and the write protect tab is not on.
103	File not open.	An attempt to open a DOS file failed. Check CONFIG.SYS file for the statement FILES=30 or higher. If necessary, increase the value.
152	Device unavailable timeout error.	Check printer to make sure power is on and it is in the On-Line ready state.
208	Main Over File Missing	Reinstall missing File
1003	Invalid file header.	An early version Intelli-Net data files were copied into the Intelli-Net subdirectory. Use the convert program to convert early version data files.

5 Support

Software Registration and Updates

A Software Registration Card was supplied with your **Intelli-Net** software package. This card should be filled out and mailed into Mettler-Toledo, Inc. to register your **Intelli-Net** program. The registration card must be received to validate you as a licensed user and entitles you to technical support, warranty, and program updates. If METTLER TOLEDO does not have your **Intelli-Net** Software Registration Card (including your Program Disk Serial Number), the company reserves the right to refuse you technical support.

Software Updates

METTLER TOLEDO may occasionally make software updates to **Intelli-Net**. Only registered **Intelli-Net** users will be notified of these updates. Depending on the nature of the change, a fee may be charged.

Software Support

If you experience a problem installing or operating your **Intelli-Net** program, you should take the following actions:

1. Check your hardware configuration to verify it meets the minimum requirements. This includes the computer, printer, scale interface, signal converter, data cabling, and scales. Consult the Getting Started section of this guide for configuration requirements.
2. Consult the **Using Intelli-Net** section to verify you are following the correct procedures.
3. Contact your local METTLER TOLEDO representative or dealer on problems relating to the scales, interfacing between the scales and computer, and software operation. If you determine the problem is related to your computer hardware or operating system software, consult the computer hardware manufacturer or the dealer where you purchased your computer hardware.

If you cannot resolve the problem by consulting the User Guide, or by contacting your local METTLER TOLEDO representative.

Before calling METTLER TOLEDO for, be sure to fill out the **Intelli-Net** problem checklist. By having this information available, you can save time and greatly improve the chances of getting your problem resolved quickly.

PROBLEM CHECKLIST

[ ] Software Serial Number: _____
(Located on Program Disk)

[ ] Software Version Number: _____
(Displayed on screen when starting program and on Program Disk.)

[ ] Computer Brand Name: _____

Model: _____ RAM Memory Installed: _____

Type (386, 486, Pentium): _____

DOS Version: _____

Monitor Brand and Type: _____

[ ] Signal Converter (If used): _____

[ ] Scales:

Model(s): _____

[ ] Modem Brand: _____

[ ] Has the **Intelli-Net** program operated properly before the problem occurred?

[ ] List the exact steps you performed prior to observing the problem.

_____
_____
_____
_____
_____

[ ] Save any printed reports or error messages. Record any error messages displayed on the screen when the problem occurred.

As a registered end user of **Intelli-Net** METTLER TOLEDO software, you have been supplied with an original software program which includes one backup provision. METTLER TOLEDO will replace the software diskettes for a $50.00 fee, if damaged within one year of the date of purchase. To request a replacement, make a copy of this Program Disk Replacement Form and submit the form to your local METTLER TOLEDO representative.

Intelli-Net PROGRAM DISK REPLACEMENT REQUEST

Software Version #: _____

Serial Number: _____

Name: _____

Address: _____

City: _____ State: _____ Zip: _____

Site Location: _____

PLEASE FORWARD THIS FORM WITH FEE TO:

Mettler-Toledo, Inc.
350 West Wilson Bridge Road
Worthington, OH 43085
ATTN: Retail Marketing

6 Software License Agreement and Warranty

Software License Agreement

Before opening the sealed program diskette envelope, you should carefully read the following terms and conditions. Opening the envelope indicates your acceptance of the terms and conditions. If you do not agree with the stated terms and conditions, you should promptly contact your Mettler Toledo representative and return the software package with the unopened envelope for a refund.

Mettler-Toledo, Inc. (The Company) provides this "software" and "related materials" to access the Company's scales. You assume responsibility for the selection of the software to achieve your intended results, for the acquisition of the computer, scales, related interface equipment compatible with the software, and for the installation, use, and results obtained from the software.

DEFINITIONS

1. Software" means the set of object code programs contained on the program disks that are in the sealed envelope, as well as any updates subsequently supplied by METTLER TOLEDO
2. "Related Materials" means all of the printed matter supplied with this package, as well as any subsequently supplied by METTLER TOLEDO.
3. "METTLER TOLEDO" means Mettler-Toledo, Inc., 350 W. Wilson Bridge Road, Worthington, Ohio 43085, the author and owner of the Software and Documentation covered in the license agreement.

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This license permits you to:

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3. Transfer the Software from one computer to another using the supplied install and uninstall procedures described in the User Guide.
4. Copy the software, provided the copies are used for backup purposes only and are kept in your possession.

This license agreement allows you to use the Software and the Related Materials; however, Mettler-Toledo, Inc. retains title to all of the Software

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This license is effective upon opening the sealed envelope containing the program diskettes. You may terminate the license at any time by destroying the Software and Related Materials together with all copies, modifications, and merged portions in any form. It will also terminate upon conditions set forth elsewhere in this Agreement, or if you fail to comply with any terms or conditions of this Agreement. You agree upon such termination to destroy the Software and Related Materials together with all copies, modifications, and merged portions in any form.

GENERAL

The Software Registration Card must be returned within fifteen (15) days of your purchase and receipt of the software. This registration card must be received by Mettler-Toledo, Inc. before you are eligible for technical support. The Company provides this Software and licenses its use in the Continental United States, Alaska, Hawaii, Puerto Rico, and such other geographic areas as The Company may from time to time designate. This Agreement will be governed by the laws of the State of Ohio.

Software Warranty

Mettler Toledo, Inc.

RETAIL SOFTWARE PRODUCTS

LIMITED WARRANTY

Mettler-Toledo, Inc. expressly warrants the equipment manufactured by it as set forth herein. The Company makes no other warranties, either express or implied (including without limitation warranties as to merchantability or fitness for a particular purpose.) In addition, the following shall constitute the sole and exclusive remedies of buyer for any breach by company of its warranties hereunder.

The Company warrants that the program disks on which the Software is recorded and the Documentation provided will be free of defects in materials and workmanship under normal use. The Company warrants that the Software will be free from errors in program logic, clerical program preparation and transcription, and will execute accordingly when installed in accordance with the Company's instructions. The warranty shall not apply when the Software is operated concurrently with other software programs not supplied by the Company or if defects occur as a result of interaction from software programs not supplied by the Company. The warranty period shall be one year from the date of shipment to the original buyer.

If the software does not meet the above warranty and if the buyer promptly notifies the Company and provides the description of the error and complete information about the manner of its discovery, the Company shall thereupon correct any defect or error (at its option) by either:

- Modifying or making available to the buyer instructions for modifying any erroneous program.
- Making available necessary corrected or replacement programs.

The foregoing warranty shall not apply to defects resulting from unauthorized modification.

DISCLAIMER OF DAMAGES

IN NO EVENT SHALL THE COMPANY BE LIABLE FOR ANY TYPE OF SPECIAL, CONSEQUENTIAL, INCIDENTAL OR PENAL DAMAGES, WHETHER SUCH DAMAGES ARISE OUT OF, OR ARE A RESULT OF BREACH OF CONTRACT, WARRANTY, TORT (INCLUDING NEGLIGENCE), STRICT LIABILITY, OR OTHERWISE. SUCH DAMAGES SHALL INCLUDE BUT NOT BE LIMITED TO LOSS OF PROFITS OR REVENUES, LOSS OF DATA, LOSS OF USE OF THE SOFTWARE, LOSS OF USE OF THE EQUIPMENT OR ASSOCIATED EQUIPMENT, COST OF SUBSTITUTE EQUIPMENT, FACILITIES, DOWN TIME COSTS, INCREASED CONSTRUCTION COSTS, OR CLAIMS OF BUYER'S CUSTOMERS OR CONTRACTORS FOR SUCH DAMAGES.

YOU ACKNOWLEDGE THAT YOU HAVE READ THIS AGREEMENT, UNDERSTAND IT, AND AGREE TO BE BOUND BY

ITS TERMS AND CONDITIONS. YOU FURTHER AGREE THAT IT IS THE COMPLETE AND EXCLUSIVE STATEMENT OF THE AGREEMENT BETWEEN US WHICH SUPERSEDES ANY PROPOSAL OR PRIOR AGREEMENT, ORAL OR WRITTEN, AND ANY OTHER COMMUNICATIONS BETWEEN US RELATING TO THE SUBJECT MATTER OF THIS AGREEMENT.

7 Appendix

Report Printer Codes

Refer to the Printer manual for additional applications

Listed Below are hex control codes for some commonly used PC printers. The hex codes are used to switch between condensed and normal print modes when printing certain reports in **Intelli-Net** on an 80 column printer. If your printer is not listed, refer to your printer manual to determine the hexadecimal codes for condensed (16-17 cpi) and normal (10-12 cpi) print modes. If you are using a wide carriage printer capable of printing at least 132 column, it is not necessary to enter any control codes. In this case the fields should be left blank.

PRINTER NAME	NORMAL PITCH	COMPRESSED PITCH
IBM Proprinter	12	0F (zero, F)
Okidata 192	1C	1D
METTLER TOLEDO 8840-0001	1B36	1B37
METTLER TOLEDO 8842/8843	12	0F (zero, F)
Toshiba 321	1B5D	1B5B
Epson	12	0F (zero, F)
Panasonic 1090/1091/1180	12	0F (zero, F)
HP Laser Jet II/III	1B287331302E3048	1B287331362E3648

8422/8423/8305 Master Scale Setup

The following configuration must be performed on Type-4 master scales when interfacing to **Intelli-Net**.

EDIT CONFIGURATION (F10.2)

- **HOST I.D. NO.** The Host I.D. number must match the number used for the scale address number in **Intelli-Net**. Do not confuse this number

with the Master I.D., or the satellite scale I.D. numbers. This number is used by **Intelli-Net** to identify the scales connected on the network.

- **HOST BAUD RATE XXXX** The baud rate must match the baud rate configured in **Intelli-Net**. Valid selections are 1200, 2400, 4800, 9600, and 19200 (with later software) baud.
- **HOST PARITY? EVEN** This is the default setting for use with **Intelli-Net**.
- **HOST BUSY HI? NO** This is the default setting for use with **Intelli-Net**.

Type-4 master scales are capable of storing PLU files in multiple departments. This configuration is the same as the department orientation in **Intelli-Net**. Master scales use department numbers instead of letters. The department numbers in master scales will correspond to the following **Intelli-Net** department codes:

MASTER	**Intelli-Net**
0	A
1	B
2	C
3	D
4	E
5	F
6	G
7	H
8	I
9	J
10	K
11	L
12	M
13	N
14	O

Type-4 8422M/8423M/8305M scales use standard RS232 for host communication. If **only one** master scale is used as a single scale connected to **Intelli-Net**, it can be connected directly to the PC's serial port. The cable between the PC and master scale is limited to 100 feet. Typical cable connection for a 25-pin and 9-pin serial port connector to a master scale is as follows:

PC **25 PIN** RS232 SERIAL PORT	9 PIN CONNECTOR 8422/8423/8305 MASTER
2 TRANSMIT	3 RECEIVE
3 RECEIVE	2 TRANSMIT

PC **25 PIN** RS232 SERIAL PORT	9 PIN CONNECTOR 8422/8423/8305 MASTER
7 SIG GROUND	7 SIG GROUND

PC **9 PIN** RS232 SERIAL PORT	9 PIN CONNECTOR 8422/8423/8305 MASTER
2 RECEIVE	2 TRANSMIT
3 TRANSMIT	3 RECEIVE
5 SIG GROUND	7 SIG GROUND

METTLER TOLEDO offers 10 foot and 100 foot cables for both configurations as follows:

0900-0242 (P/N 13065500A) Cable, 25 Pin Serial Port to Master Scale 100 foot.

0900-0241 (P/N 13065400A) Cable, 9 Pin Serial Port to Master Scale 100 foot.

0900-0286 (P/N 13816300A) Cable, 25 Pin Serial Port to Master Scale 10 foot.

0900-0285 (P/N 13816200A) Cable, 9 Pin Serial Port to Master Scale 10 foot.

If multiple scales are used, conversion to RS485 multidrop network communication interface will be required. In this type of application, a METTLER TOLEDO Serial Converter will be required at the PC and each master scale. Refer to the Hardware Configuration And Installation Guide for additional information.

8423SA Scale Setup

Enter the scale setup mode by placing the setup switch to ON. The setup switch is located under the dead deck cover in an access hole in top cover on the left side of the scale. The 8423SA configuration must be set as follows:

- **HOST I.D. NO.**

The one or two digit Host I.D. number must match the scale address number programmed in Intelli-Net.

- **HOST BAUD RATE XXXX**

The baud rate must match the baud rate setup in **Intelli-Net**. Valid selections are 1200, 2400, 4800, and 9600 baud.

- **HOST PARITY? EVEN**

This is the default setting for use with **Intelli-Net**.

HOST BUSY HI? NO

This is the default setting for use with **Intelli-Net**.

The 8423SA scales use standard RS232 for host communication. If **only one** scale is being used with **Intelli-Net**, the 8423SA can be connected directly to the PC's RS232 serial port. Maximum cable length is limited to 100 feet. Typical cable connections from either a 25 or 9 pin serial port connector to the 8423SA is as follows:

PC **25 PIN** RS232 SERIAL PORT	9 PIN CONNECTOR AT 8423SA SCALE
2 TRANSMIT	2 RECEIVE
3 RECEIVE	3 TRANSMIT
7 SIG GROUND	9 SIG GROUND

PC **9 PIN** RS232 SERIAL PORT	9 PIN CONNECTOR AT 8423SA SCALE
2 RECEIVE	3 TRANSMIT
3 TRANSMIT	2 RECEIVE
5 SIG GROUND	9 SIG GROUND

If multiple scales are used, conversion to RS485 multidrop network communication interface will be required. In this type of application, a METTLER TOLEDO Serial Converter will be required at the PC and each 8423SA scale. Refer to the Hardware Section Guide for additional information. A METTLER TOLEDO 8423SA Cable Adapter (Factory Number 0901-0260) can be purchased to allow the standard Master Scale to PC cables to be used with the 8423SA.

8301C Scale Setup

The following setup procedure must be followed when installing the model 8301C scale on a **Intelli-Net** network. (Note: Switches marked with * can be set as needed for the application).

STEP 1: SET LOGIC PCB PROGRAM SWITCHES

SWITCH 1	SWITCH 2	SWITCH 3

SWITCH 1	SWITCH 2	SWITCH 3
1-1 OFF	2-1 *	3-1 OFF
1-2 OFF	2-2 ON	3-2 ON
1-3 OFF	2-3 *	3-3 *
1-4 OFF	2-4 *	3-4 *
1-5 OFF	2-5 *	3-5 *
1-6 OFF	2-6 *	3-6 OFF
1-7 OFF	2-7 ON	3-7 *
1-8 OFF	2-8 OFF	
1-9 OFF	2-9 *	

STEP 2: SET COMMUNICATION/MEMORY PCB PROGRAM SWITCHES

SWITCH 1	SWITCH SETTING
1-1	ON=9600 BAUD, OFF=1200 BAUD
1-2	OFF
1-3	OFF
1-4	OFF
1-5	OFF
1-6	OFF
1-7	OFF

If an existing scale PLU file is to be uploaded into Intelli-Net, skip step 3, and continue with step 4.

STEP 3: INITIALIZE SCALE MEMORY

To initialize the model 8301C memory:

- Disconnect power to the scale, then remove the top cover.
- Set the Logic PCB switch SW1-3 to ON.
- Press and hold the **CLEAR** key on the 8301 keyboard while connecting power to the scale. Release the **CLEAR** key when **-0000-** is displayed. After several seconds, the display will show **-0626-** (standard 626 PLU capacity scales) or **-1004-** (for units with added memory chips) indicating the initialization is completed and all RAM checks good.
- Disconnect power to the scale. Set Logic PCB switch SW1-3 back to OFF. Replace the top cover.

STEP 4: ENTER HOST I.D. NUMBER

Use the following procedure to enter the Host I.D. number:

- Turn the "Set Date And Operator Number" rotary switch to the **TEST** position.
- Using the 8301 key, set the Price Rite switch to the **FILE PRINT OUT** position. The display should show **00**.
- Press the following sequence of keys: **7 0 /** (seven, digit zero, slash). The display should now show two dashes: **_ _** .
- Next enter the Host I.D. number then press the **ENTER** key. Use only even numbers for the 8301C I.D. number. The display will blank after entering the number.
- To verify your entry, press the **RESET** key, then enter: **7 2 /** The Host I.D. number should then display.
- Return the Operator and Price Rite switches back to the RUN positions.

The scale should now be ready to operate with **Intelli-Net**.

8427SA Scale Setup

The following setup must be performed for the 8427SA to communicate with **Intelli-Net**.

- **EDIT CONFIGURATION** - Press **/6** on the scale keyboard, then press **1** for Edit Configuration. The following information must be configured:

ENTER HOST ID: Enter a two digit number (01-99) to correspond to the scale ID programmed in the PCS store configuration.

HOST BAUD RATE: Select baud rate to match baud rate selected in the PCS store configuration.

HOST PARITY: Use the default of **EVEN**.

DEPT NUMBER: (Later versions of software only.) Allows the department code number to be set to maintain compatibility with master scales using department numbers.

- **SET SOFTSWITCHES** - Use the scale setup switch under the platter to set the following:

4 DIGIT HOST? - If you are using a 4 digit PLU number, set this prompt to **YES**. If you are using a 6 digit PLU number, answer **NO**. When backing up 6-digit scales, remember to name the files according to PLU length (Ex: 8427_6D.000, 8427_4D.000). Files backed up from 6-digit scales cannot be restored to scales setup for 4-digit PLU numbers.

- **CABLES** - The 8427SA requires the use of an RS232/RS422 converter at the PC. A connection kit 0901-0218 is available to connect the scale to the RS422 scale network.

8425 Scale Setup

If an existing scale PLU file is to be uploaded into Intelli-Net, skip step 2, and continue with step 3.

The following setup must be performed when connecting the model 8425 to the **Intelli-Net** scale network.

STEP 1: SET THE SCALE BAUD RATE PROGRAM SWITCHES

Set the following switches on the scale Main Logic PCB for the baud rate you will be using.

1200 BAUD	**9600 BAUD**
SW3-1 ON	SW3-1 OFF
SW3-2 OFF	SW3-2 ON

STEP 2: INITIALIZE THE SCALE MEMORY

- Place the scale keyswitch to the **LOAD** position.
- Enter the following keystrokes: **1 2 ENTER 9 9 / ENTER**

STEP 3: ENTER HOST I.D. NUMBER

With the keyswitch in the **LOAD** position, enter Function Code 18 (1 8 ENTER). Next, enter the one or two digit Host I.D. number; then, press the **ENTER** key.

STEP 4: SET SOFTSWITCHES

Set the softswitches as needed for the application, with the exception of SSW #6 which must be ON.

Type 9 Scale Setup (8460M, 8461M, 8360M, 8450SA, 355SA)

The following configuration must be performed on type 9 scales when interfacing to Intelli-Net.

Master Set Up

To setup the 8460/8360/8461 master for use with Intelli-Net, first check the host configuration settings. Touch ***Setup***, then select ***Master***. When asked for the master password, just touch ***Enter*** if no password has been programmed, or enter the password if one has previously been programmed. ***(Note: If the master password is not known, use the service password 7627.)*** The Master Editor screen is shown in Figure 7.1.

Next touch ***conFig***, as shown in Figure x. The configuration options will then display.

Edit	Quick	Print	Report	Clear	copY	conFig	Quit
					pLu record defaults		
					pAsswords		
					Store/department info.		
					Department number		
					auTo configure rate		

Figure 7.1

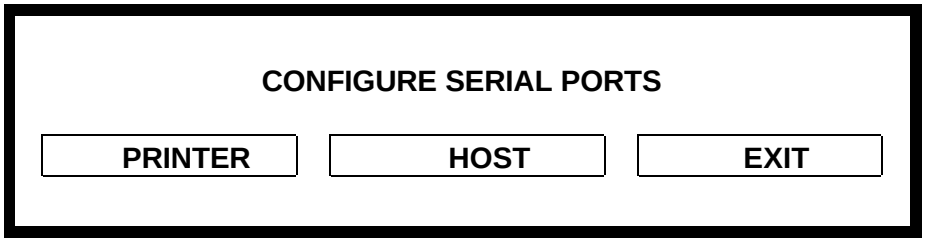


Figure 7.2 Master Peripheral Selection Screen

Touching Host will display the screen shown in Figure 7.2 and allow configuration of the port for a host and DataBack.

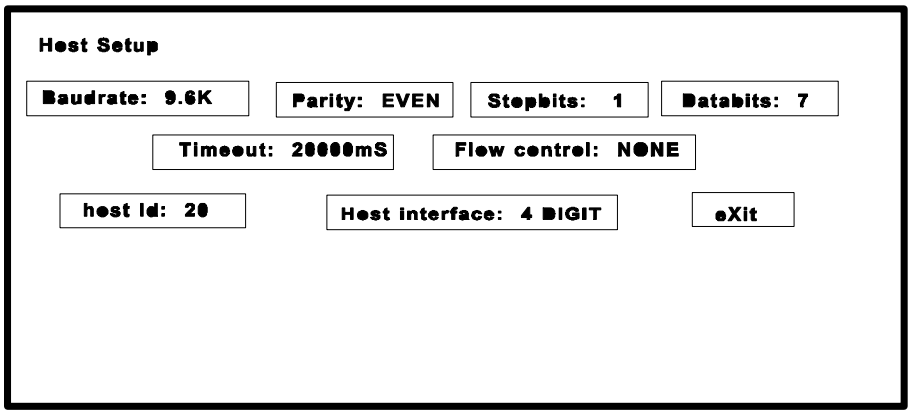


Figure 7.3 Host Port Setup Screen

Stand Alone Set Up

To setup an 8450 or 355 SA for use with Intelli-Net, first check the host configuration settings

Press:	Display will show:
[SETUP]	"UNIT"
[ENTER]	"SELECT FUNCTION"
[HOST]	"BAUD RATE: XX"

.

Use the [DOWN] and [UP] keys to move through the values below. Use [ENTER] to change data and [CLEAR] to erase data and back out of the menu.

Host Port Configuration

The selections for the Host Port configuration are as follows:

Baud Rate	The baud rate (in Kilobytes) can be selected from 1.2k to 115.2k. This must match the baud rate of the host or DataBack. The default is 9600 baud.
Parity	Parity of Even, Odd, Low, High, and Off can be selected. Use EVEN parity for Intelli-Net and DataBack. (Note: Off and No parity are the same.)
Stop Bits	Selections are 1, 1.5, and 2. Use 1 Stop Bit for Intelli-Net or DataBack. The default is 1.
Data Bits	Selections are 5, 6, 7, and 8 data bits (sometimes called word length). Use 7 data bits for Intelli-Net or DataBack.
Time Out	This selection is used to end host communications if no response is detected. The default is 20000mS (milliseconds).
Flow Control	This selects either hardware, software, or no handshaking. Flow Control sets up communication between the host device and a peripheral that will start and stop data transfer to prevent an overflow condition. Use NONE with Intelli-Net or DataBack.
Host ID	The host ID is used by a host computer to communicate with a specific device. This number must match the number programmed at the host to identify this master. ID numbers from 1 to 99 can be used, but must not be duplicated if other units are connected to the host. ***NOTE: POWER MASTER DOWN AFTER CHANGING THE HOST ID TO RESET THE ID IN MEMORY.***
Host Interface	This selection is used to configure external host communications for a 6-digit PLU or a 4-digit PLU database.

Department Configuration

Master

Type-9 master scales are capable of storing PLU files in multiple departments. This configuration is the same as the department orientation in **Intelli-Net**. Master scales use department numbers instead of letters. The department numbers in master scales will correspond to the following **Intelli-Net** department codes:

MASTER	Intelli-Net
0	A
1	B

2	C
3	D
4	E
5	F
6	G
7	H
8	I
9	J
10	K
11	L
12	M
13	N
14	O

Stand Alone

8450 and 355 Stand Alone can only operate in one department at a time and can only hold PLU information for one department. Uploading and downloading of data must be done through the department functions menu. The department number and letter configuration listed above still applies in the Stand Alone.

Type 9 wiring

Type 9 scales use standard RS232 for host communication. If **only one** scale is used as a single scale connected to **Intelli-Net**, it can be connected directly to the PC's serial port. The cable between the PC and scale is limited to 100 feet. Typical cable connection for a 25-pin and 9-pin serial port connector to a scale is as follows:

PC **25 PIN** RS232 SERIAL PORT	9 PIN CONNECTOR 8460 MASTER
2 TRANSMIT	3 RECEIVE
3 RECEIVE	2 TRANSMIT
7 SIG GROUND	7 SIG GROUND

PC **9 PIN** RS232 SERIAL PORT	9 PIN CONNECTOR 8460/8360/8461/8450/355
2 RECEIVE	2 TRANSMIT
3 TRANSMIT	3 RECEIVE
5 SIG GROUND	7 SIG GROUND

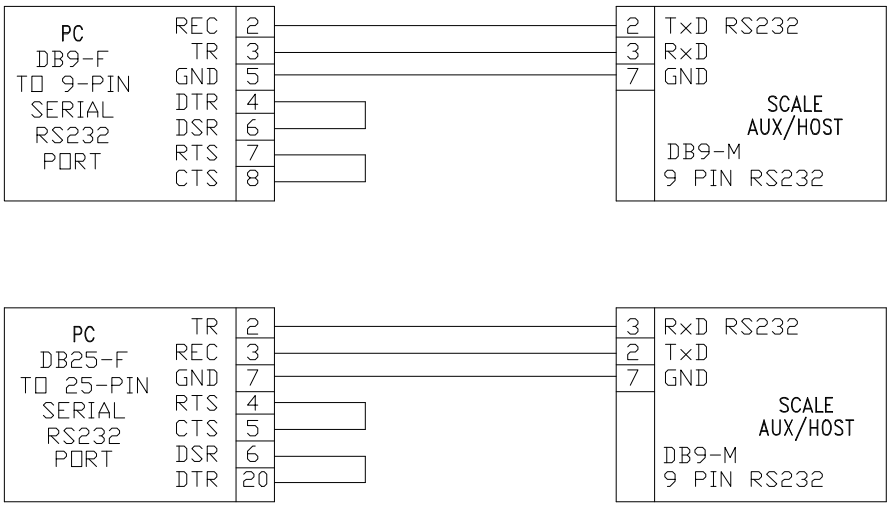


Figure: 7.4

METTLER TOLEDO offers 10 foot and 100 foot cables for both configurations as follows:

0900-0242 (P/N 13065500A) Cable, 25 Pin Serial Port to Master Scale 100 foot.

0900-0241 (P/N 13065400A) Cable, 9 Pin Serial Port to Master Scale 100 foot.

0900-0286 (P/N 13816300A) Cable, 25 Pin Serial Port to Master Scale 10 foot.

0900-0285 (P/N 13816200A) Cable, 9 Pin Serial Port to Master Scale 10 foot.

0900-0298 (P/N 14102800A) Cable, PC DB25 2 scale 25 foot.

If multiple scales are used (or when running over 100 feet cable length), conversion to RS422 multidrop network communication interface will be required. In this type of application, a METTLER TOLEDO Serial Converter will be required at the PC and each scale. Refer to the Hardware Configuration And Installation Guide for additional information.

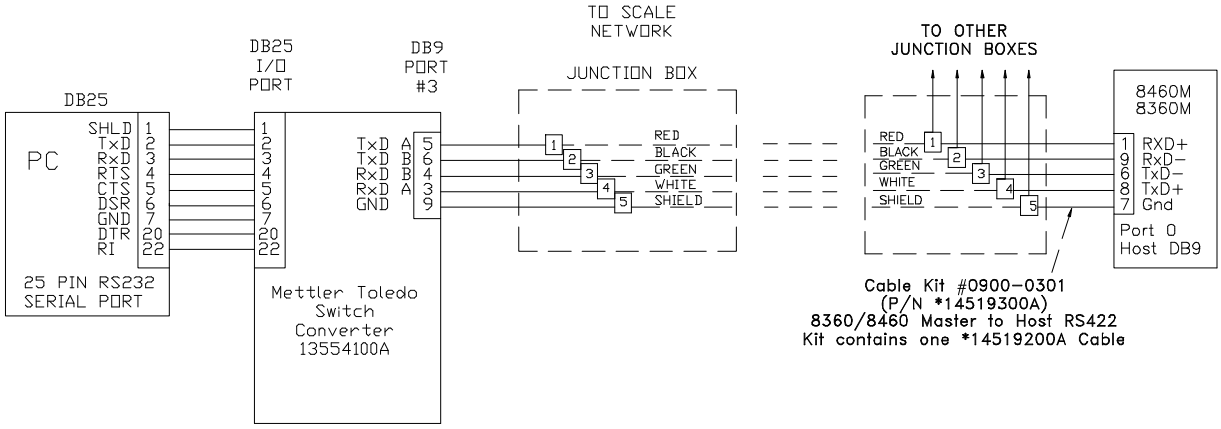


Figure 7.5

350 Printer Set Up

The 350 Ingredient Printer must be set-up and configured prior to communication with Intelli-Net. The 350 requires the use of an RS232/RS422converter. The Model 350 and Model 8425 use the same host interface cable.

When setting up a new printer, refer to Tech Manual TM000350FR01, Section 5 for setup instructions. For existing printers, follow these steps:

Enter setup mode by turning keyswitch to **LOAD** position, then use appropriate
function code to enter the data.

SSW 13 HOST COMPUTER BAUD RATE - Enter Function Code 63 to enter Softswitch menu. Press **ENTER** to advance to **SW13 HOST BR** (for host baud rate). Press the /(slash) key to toggle between 300 and 9600 baud. When correct baud rate displayed, press **ENTER,** then **CLEAR** to exit the menu. The baud rate must match rate selected in the DATABACK scale configuration.

HOST ID NUMBER - Enter Function Code 62 to enter the **Address** number. This must match the scale address in DATABACK scale configuration.

Modem Setup

Intelli-Net requires a Hayes™ Smartmodem (1200, 2400, 9600, 14400, or 28800 baud) or 100% Hayes compatible modem using the industry standard Hayes **AT**® command set for communication to remote stores. The Hayes and most compatible modems are setup using software commands. These commands can be sent from most any type of communications software. A modem setup utility program called **TCOM** is supplied with **Intelli-Net**. To start up the program, type in **TCOM** (from the Intelli-Net Subdirectory) and press the **ENTER** key. Follow the instructions on the screen to set the modem up for either remote scale network use, or use at the PC. If you use a communications software program to set up a modem for a remote store scale network, the following modem commands should be used:

REMOTE STORE MODEM

The modem must be set for autoanswer mode. The command to set the modem to answer on the first ring is: **ATS0=1&W**

- The modem must be set to over-ride or ignore DTR status. The standard AT command to ignore/over-ride DTR is: **AT&D0&W**

MODEM AT THE PC

Modems used at the PC do not normally require any special setup. DTR can be set either way for Intelli-Net.

ASCII Chart

ASCII Standard and Control Characters												
Char.	Dec.	Hex.	Char.	Dec.	Hex	Char.	Dec.	Hex.	Char.	Dec.	Hex.
NUL	0	00	SP	32	20	@	64	40	`	96	60
SOH	1	01	!	33	21	A	65	41	a	97	61
STX	2	02	”	34	22	B	66	42	b	98	62
ETX	3	03	#	35	23	C	67	43	c	99	63
EOT	4	04	$	36	24	D	68	44	d	100	64
ENQ	5	05	%	37	25	E	69	45	e	101	65
ACK	6	06	&	38	26	F	70	46	f	102	66
BEL	7	07	’	39	27	G	71	47	g	103	67
BS	8	08	(	40	28	H	72	48	h	104	68
HT	9	09	)	41	29	I	73	49	i	105	69
LF	10	0A	*	42	2A	J	74	4A	j	106	6A
VT	11	0B	+	43	2B	K	75	4B	k	107	6B
FF	12	0C	,	44	2C	L	76	4C	l	108	6C
CR	13	0D	-	45	2D	M	77	4D	m	109	6D
SO	14	0E	.	46	2E	N	78	4E	n	110	6E
SI	15	0F	/	47	2F	O	79	4F	o	111	6F
DLE	16	10	0	48	30	P	80	50	p	112	70
DC1	17	11	1	49	31	Q	81	51	q	113	71
DC2	18	12	2	50	32	R	82	52	r	114	72
DC3	19	13	3	51	33	S	83	53	s	115	73
DC4	20	14	4	52	34	T	84	54	t	116	74
NAK	21	15	5	53	35	U	85	55	u	117	75
SYN	22	16	6	54	36	V	86	56	v	118	76
ETB	23	17	7	55	37	W	87	57	w	119	77
CAN	24	18	8	56	38	X	88	58	x	120	78
EM	25	19	9	57	39	Y	89	59	y	121	79
SUB	26	1A	:	58	3A	Z	90	5A	z	122	7A
ESC	27	1B	;	59	3B	[	91	5B	{	123	7B
FS	28	1C	<	60	3C	\	92	5C	|	124	7C
GS	29	1D	=	61	3D	]	93	5D	}	125	7D
RS	30	1E	>	62	3E	^	94	5E	~	126	7E
US	31	1F	?	63	3F	_	95	5F		127	7F

ASCII Standard and Control Characters												
Char.	Dec.	Hex.	Char.	Dec.	Hex	Char.	Dec.	Hex.	Char.	Dec.	Hex.
Ç	128	80	á	160	A0	lb	192	C0	°	248	F8

ü	129	81
é	130	82
ã	131	83
ä	132	84
à	133	85
å	134	86
ç	135	87
	136	88
ë	137	89
è	138	8A
ï	139	8B
î	140	8C
ì	141	8D
Ä	142	8E
Å	143	8F
É	144	90
æ	145	91
Æ	146	92
ô	147	93
ö	148	94
ò	149	95
û	150	96
ù	151	97
ÿ	152	98
Ö	153	99
Ü	154	9A
¢	155	9B
£	156	9C
¥	157	9D
Pt	158	9E
ƒ	159	9F

í	161	A1
ó	162	A2
ú	163	A3
ñ	164	A4
Ñ	165	A5
	166	A6
	167	A7
¿	168	A8
	169	A9
	170	AA
	171	AB
	172	AC
¡	173	AD
«	174	AE
»	175	AF
	176	B0
	177	B1
	178	B2
	179	B3
	180	B4
	181	B5
	182	B6
	183	B7
	184	B8
	185	B9
	186	BA
	187	BB
	188	BC
	189	BD
	190	BE
	191	BF

	193	C1
	194	C2
	195	C3
oz	196	C4
	197	C5
	198	C6
	199	C7
	224	E0
ß	225	E1
	226	E2
	227	E3
	228	E4
	229	E5
	230	E6
	231	E7
	232	E8
	233	E9
	234	EA
	235	EB
	236	EC
	237	ED
	238	EE
	239	EF
≡	240	F0
±	241	F1
≥	242	F2
≤	243	F3
Ø	244	F4
ø	245	F5
÷	246	F6
	247	F7

¨	249	F9
•	250	FA
§	251	FB
	252	FC
	253	FD
	254	FE
	255	FF

ASCII Characters in Special Character Set

Char.	Name	Hex.	Char.	Name	Hex.	Char.	Name	Hex.
NUL	Null	00	SP	Space	20	`	Left Single Quote	60
SOH	Start of Header	01	!	Exclamation	21	a		61
STX	Start of Text	02	”	Quote	22	b		62
ETX	End of Text	03	#	Number Sign	23	c		63

EOT	End of Trans.	04
ENQ	Enquire	05
ACK	Acknowledge	06
BEL	Bell	07
BS	Backspace	08
HT	Horizontal Tab	09
LF	Line Feed	0A
VT	Vertical Tab	0B
FF	Form Feed	0C
CR	Carriage Return	0D
SO	Shift Out	0E
SI	Shift In	0F
DLE	Data Link Escape	10
DC1	Device Control 1	11
DC2	Device Control 2	12
DC3	Device Control 3	13
DC4	Device Control 4	14
NAK	Negative Ack.	15
SYN	Synchronous Idle	16
ETB	End Trans. Block	17
CAN	Cancel	18
EM	End of Medium	19
SUB	Substitute	1A
ESC	Escape	1B
FS	Field Separator	1C
GS	Group Separator	1D
RS	Record Separator	1E
US	Unit Separator	1F

$	Dollar	24
%	Percent	25
&	Ampersand	26
’	Apostrophe	27
(	Left Parenthesis	28
)	Right Parenthesis	29
*	Asterisk	2A
+	Plus	2B
,	Comma	2C
-	Hyphen	2D
.	Period	2E
/	Forward Slash	2F
:	Colon	3A
;	Semicolon	3B
<	Less Than	3C
=	Equal	3D
>	Greater Than	3E
?	Question	3F
@	At	40
[	Left Bracket	5B
\	Back Slash	5C
]	Right Bracket	5D
^	Caret	5E
_	Underline	5F

d		64
e		65
f		66
g		67
h		68
i		69
j		6A
k		6B
l		6C
m		6D
n		6E
o		6F
p		70
q		71
r		72
s		73
t		74
u		75
v		76
w		77
x		78
y		79
z		7A
{	Left Brace	7B
|	Pipe	7C
}	Right Brace	7D
~	Tilde	7E
DEL	Delete	7F

8 Glossary

Asynchronous Communication Adapter	A type of serial interface. Generally refers to the RS232 Serial Port in a PC (or COM Port).
Accumulator	A data register that holds a value such as weight accumulation.
Department	An area in a supermarket that sells a particular type of commodity such as meat, cheese, bakery, etc. **Intelli-Net** defines a department as a group of scales that use a common PLU file.
Department Production File	A data file that contains the production totals from a particular department.
Edit	The procedure of adding/modifying/deleting data in a file.
File	A collection of data, usually stored on a disk or in memory, consisting of multiple records.
Field	An individual piece of data in a record.
Floppy Disk	A flexible, removable storage device, used on a PC that can be used to store data or programs. The 3.5 inch and 5.25 inch diskettes are common in both high and low density. The density refers to the amount of storage capacity. The 3.5 inch high density diskettes can store up to 1.44 megabyte of data. The 3.5 inch low density can store up to 720 kilobytes of data (roughly half of the high density). The 5.25 inch high density diskettes can store 1.2 meg, and the low density, 360 k.
Hard Disk	A non-removable, rigid disk memory in a sealed unit that is used for permanent storage of data. Hard disks are usually permanently installed internally in a computer. The hard disk is much faster than a floppy diskette, and can have storage capacities from 10 meg a bytes to more than 5 gig bytes.
Interface	A method of connecting two or more different devices.
Item Number	The five or six digit number that is encoded in a printed UPC bar code that identifies the item or commodity.
Master File	A collection of PLU records, extra text records, etc., that contains all of the records in **Intelli-Net**.
Memory	The type of storage used in the scales and a PC. Generally referred to as RAM (Random Access Memory). The RAM in a PC will only store data as long as the power is on. The RAM used in scales is usually battery backed to retain the data in the event of power loss.
Menu	A group of messages on the PC's screen that gives the operator a choice of actions.
Monitor	The PC's display screen. Monitors can be monochrome (using a single color only) or color.
PC	Common term designating a personal computer.
Password	A set of characters the operator must type in to gain access to certain program functions.
Pending File	A temporary file that will be used to update to update a master file and the scale's PLU file.
PLU	Abbreviation for Price Look Up. In **Intelli-Net**, a PLU record indicates a record containing an item description, price, tare, extra text, shelf

	life, etc.
Port	A computer's interface to another device.
RAM	Random Access Memory. (see Memory)
Record	A group of data fields.
RS232	A type of interface used by computers to communicate with a single device, such as a modem.
RS422/485	A type of interface used by computers to communicate with multiple devices at a longer distance than RS232 is capable.
Sale Item	A PLU that is flagged in the master file as being on sale.

Hardware Accessory List

Hardware accessories for the Intelli-Net scale network are shown in Table 9-1.

DESCRIPTION	PRODUCT ID#
RS232/RS422 Converter/Switch & Cable Kit For PC	0918-0004
RS232/RS422 Converter & Cable Kit For Modem	0918-0006
RS232/RS422 Converter (converter only - no cables)	0918-0022
RS232/RS422 Converter/Switch (converter/switch only - no cables)	0918-0023
RS232/RS422 Converter & Cable Kit for 8422/8423/8035/8460 Master Scales	0901-0222
Data Cable - 100 ft (J-Box to J-Box, 22 gauge, 4-conductor shielded)	0900-0226
Data Cable - 200 ft (J-Box to J-Box, 22 gauge, 4-conductor shielded)	0900-0227
Data Cable - 500 ft (J-Box to J-Box, 22 gauge, 4-conductor shielded)	0900-0228
Junction Box, General Purpose	0904-1012
Junction Box, Waterproof	0904-1011
Scale Interconnection Kit for Model 8427SA (Includes cable from scale to J-Box and J-Box)	0901-0218
Scale Interconnection Kit for Model 8301C (Includes cable from scale to J-Box and J-Box)	0901-0219
Scale Interconnection Kit for Model 8425/350 (Includes cable from scale to J-Box and J-Box)	0901-0220
Scale Interconnection Kit for Model Type 9 scales (Includes cable from scale to J-Box and J-Box)	0901-0301
Adapter for 8423-2200 to use standard 8422 cables	0901-0260
Cable, PC 9-Pin Serial Port to 25 Pin Modem (6 ft)	0900-0238
Cable, PC 25-Pin Serial Port to 25 Pin Modem (6 ft)	0900-0239
Cable, PC 9-Pin Serial Port to 8422/8423/8305/8460 Master (100 ft)	0900-0241
Cable, PC 9-Pin Serial Port to 8422/8423/8305/8460 Master (25 ft)	0900-0298
Cable, PC 9-Pin Serial Port to 8422/8423/8305/8460 Master (10 ft)	0900-0285
Cable, PC 25-Pin Serial Port to 8422/8423/8305/8460 Master (100 ft)	0900-0242
Cable, PC 25-Pin Serial Port to 8422/8423/8305/8460 Master (25 ft)	0900-0297
Cable, 25-Pin Serial to 8422/8423/8305/8460 Master (10 ft)	0900-0286
Cable, 25-Pin Modem to 8422/8423/8305/8460 Master (100 ft)	0900-0240

Table 9-1 Hardware Accessory List

RS232/RS422 Converters

0918-0004 PC converter/Switch Box Kit

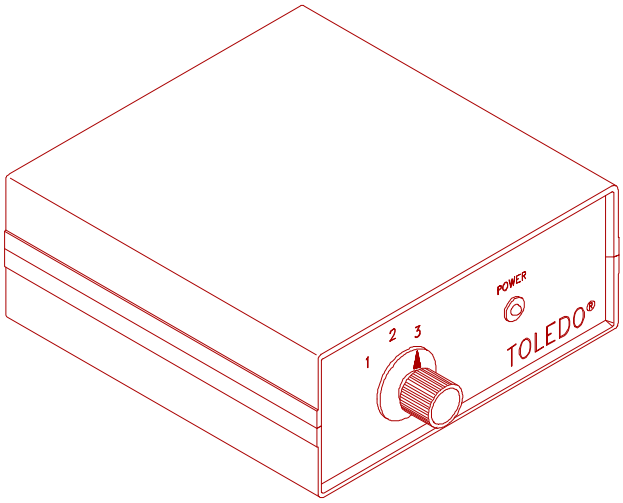
When multiple scales are used, the RS232 Signal at the PC must be converted to RS422. The 0918-0004 kit will convert the PC's standard RS232 signals to RS422 signals allowing the PC to communicate with up to 24 devices on one line. The contents of the 0918-0004 RS232/RS422 Converter\Switch Box Kit for the PC is shown in Table 9-2.

PART NUMBER	DESCRIPTION	QTY
12938500A	Cable, PC 25-Pin Serial Port to Converter/Switch Box	1
12938600A	Cable, PC 9-Pin Serial Port to Converter/Switch Box	1
12946900A	Cable, J-Box to Converter/Switch Box	1
13065900A	J-Box Assembly	1
13554100A	RS232/RS422 Converter/Switch Box w/wall transformer	1

Table 9-2 0918-0004 PC Converter/Switch Box Kit

When using the converter with the scale network, the rotary switch must be set to # 3.

The 0918-0004 kit is designed for applications requiring RS422 multidrop communications. Both 9-Pin and 25-Pin cables are included in the kit to connect to 9 or 25 pin serial port connectors at the PC. The converter is powered by a plug-in 120 VAC wall transformer which supplies 12 VDC to the converter (Figure 9.1). The converter/switch box features a rotary selector switch which is used to select RS422 on port #3 or straight through RS232 I/O on ports 1 and 2. Ports 1 and 2 can be used to connect other RS232 devices to a single PC serial port connector.



13554100A RS232/RS422 Converter/Switch Box

Figure 9.1

0918-0006 MODEM CONVERTER KIT

The 0918-0006 RS232/RS422 Modem Converter Kit is used to connect a Hayes® or compatible modem to an RS422 scale network, or to a scale using an RS422 interface (refer to Table 1-1). The converter is similar to the converter shown in the 0918-0004 Kit, except without the rotary switch and ports 1 and 2 (Figure 9.2). The kit contents are shown in Table 9-3.

PART NUMBER	DESCRIPTION	QTY
13065200A	Cable, Modem to Converter Box	1
12946900A	Cable, J-Box to Converter/Switch Box	1
13065900A	J-Box Assembly	1
13554100A	RS232/RS422 Converter w/wall transformer	1

Table 9-3 0918-0006 Modem Converter Kit

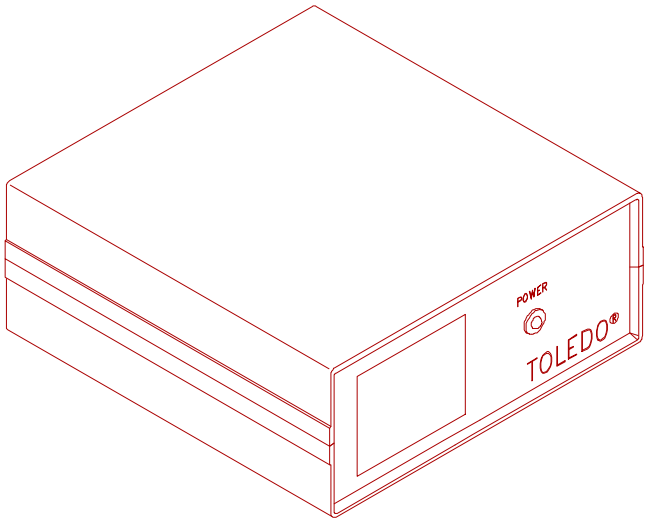


Figure 9.2 13554200A RS232/RS422 Converter

0901-0222 MASTER SCALE CONVERTER KIT

The 0901-0222 kit is used to connect 8422/8423/8305 master scales to an RS422 multidrop scale network. The converter is the same as used in the 0918-0006 kit (Figure 9.2), with the internal jumper set different (refer to 3.4 Jumper Settings). This kit can be used with the 8423-2200 stand alone scale with the addition of the 0901-0260 host adapter which is required between the scale and the converter cable. The kit contents are shown in Table 9-4. (Note: This converter can be used at a PC or Modem by changing the internal jumper, as shown in Table 9-5.)

PART NUMBER	DESCRIPTION	QTY
13065600A	Cable, Converter to Master Scale (8422/84223/8305)	1
13065700A	Cable, J-Box to Converter	1
13065900A	J-Box Assembly	1
13554100A	RS232/RS422 Converter w/wall transformer	1

Table 9-4 Master Scale Converter Kit

Table 9-5 also shows the DIP switch settings used in the old style Mettler Toledo converter. The old style converter functions the same as the new style converter and uses the same wiring. The old style converter uses push buttons on the front panel instead of the new style rotary switch selector.

CONVERTER JUMPER SETTINGS

The converter is sent from the factory with the internal jumper controlling the transmit line set for the intended application (based on the factory number.) If the converter is used for a different application, the internal configuration may need to be changed. The current converter uses a four position jumper to select the transmitter control status as shown in Table 9-5.

FACTORY NUMBER	CONFIGURATION	APPLICATION	NEW STYLE CONVERTER JUMPER W1 POSITION	OLD STYLE CONVERTER SWITCH SW1 0=OFF, 1==ON 1 2 3 4 5 6 7 8
0918-0004	TRANS ALWAYS ON	HOST COMPUTER	3 & 4 SHORTED	0 0 0 1 0 0 0 0
0918-0006	TRANS ALWAYS ON	MODEM	3 & 4 SHORTED	0 0 0 1 0 0 0 0
0901-0222	TRANS CONTROLLED BY RTS (inverted)	MASTER SCALE TO SCALE NETWORK	2 & 4 SHORTED	1 0 1 0 1 0 0 0

Table 9-5 Converter Jumper Settings

Scale/Printer Interconnect Kits

0901-0220 8425/350 INTERCONNECT KIT

The 0901-0220 kit contains a cable that is open ended to wire tie into the main data cable J-Box and the other end to connect to the 8425/350 Host Port. The kit contents are shown in Table 9-3-1.

PART NUMBER	DESCRIPTION	QTY
A13065800A	Cable, J-Box to 8425/350 (25 ft)	1
13065900A	J-Box Assembly, General Purpose	1

Table 9-3-1 0901-00220 Kit

0901-0219 8301C INTERCONNECT KIT

The 0901-0219 kit contains a cable that is open ended to wire tie into the main data cable J-Box and the other end to connect to the 8301C J32 Host/Tape Port. The kit contents are shown in Table 9-3-2.

PART NUMBER	DESCRIPTION	QTY
12947200A	Cable, J-Box to 8301C (25 ft)	1
13065900A	J-Box Assembly, General Purpose	1

Table 9-3-2 0901-0219 Kit

0901-0218 8427SA INTERCONNECT KIT

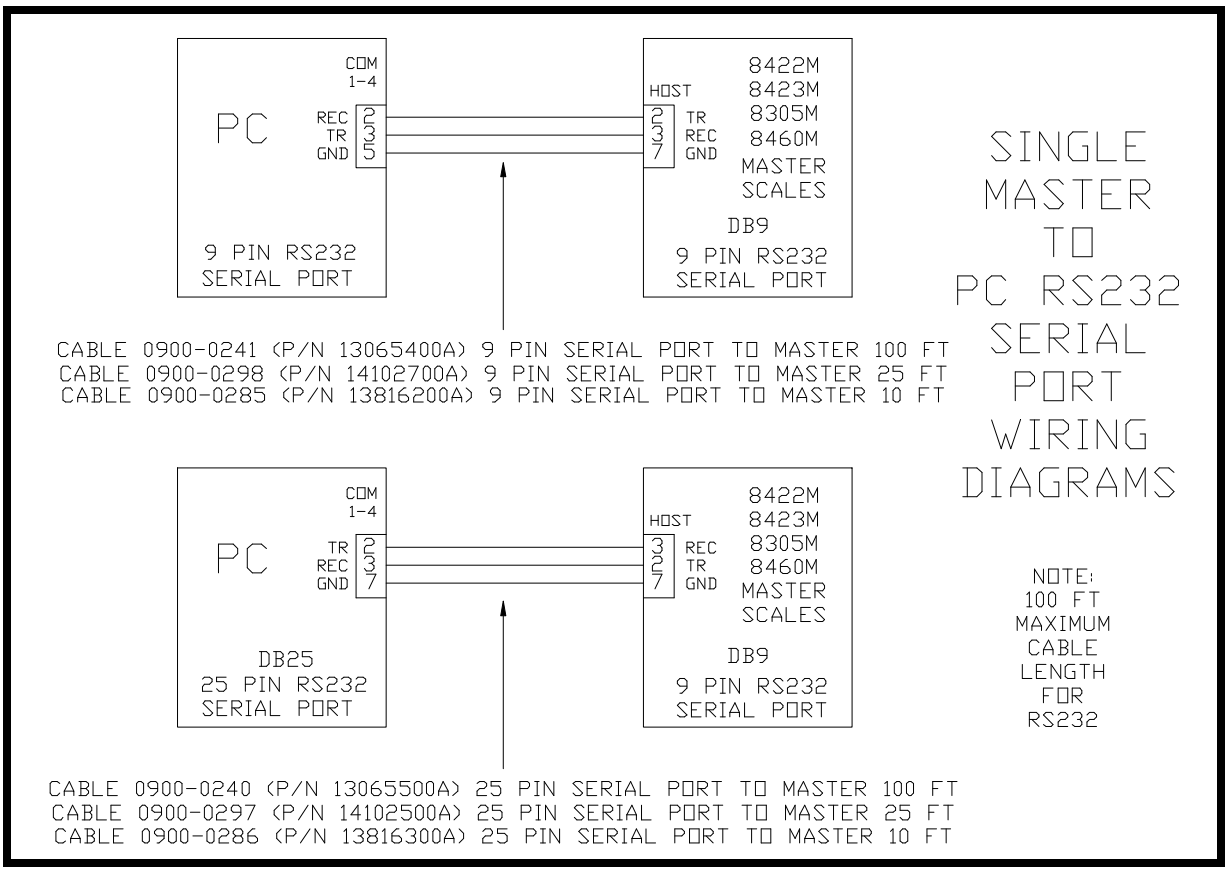
The 0901-0218 kit contains a cable that is open ended to wire tie into the main data cable J-Box and the other end to connect to the 8427SA Host Port. The kit contents are shown in Table 9-3-3.

PART NUMBER	DESCRIPTION	QTY
12946900A	Cable, J-Box to 8427SA (25 ft)	1
13065900A	J-Box Assembly, General Purpose	1

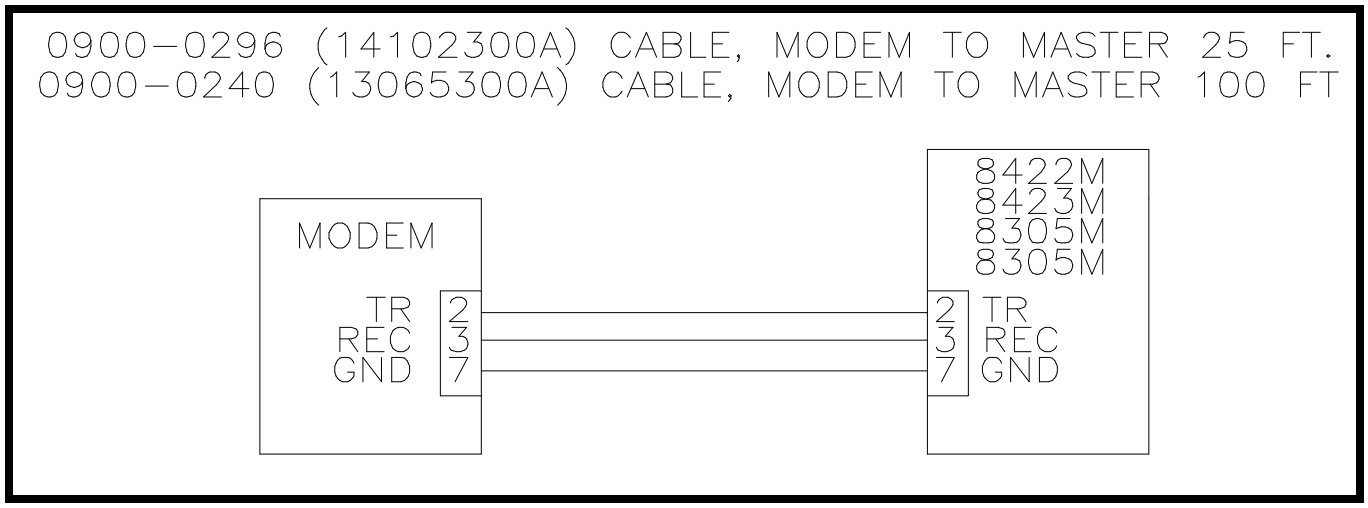
Table 9-3-3 0901-0218 Kit

Interconnect Wiring

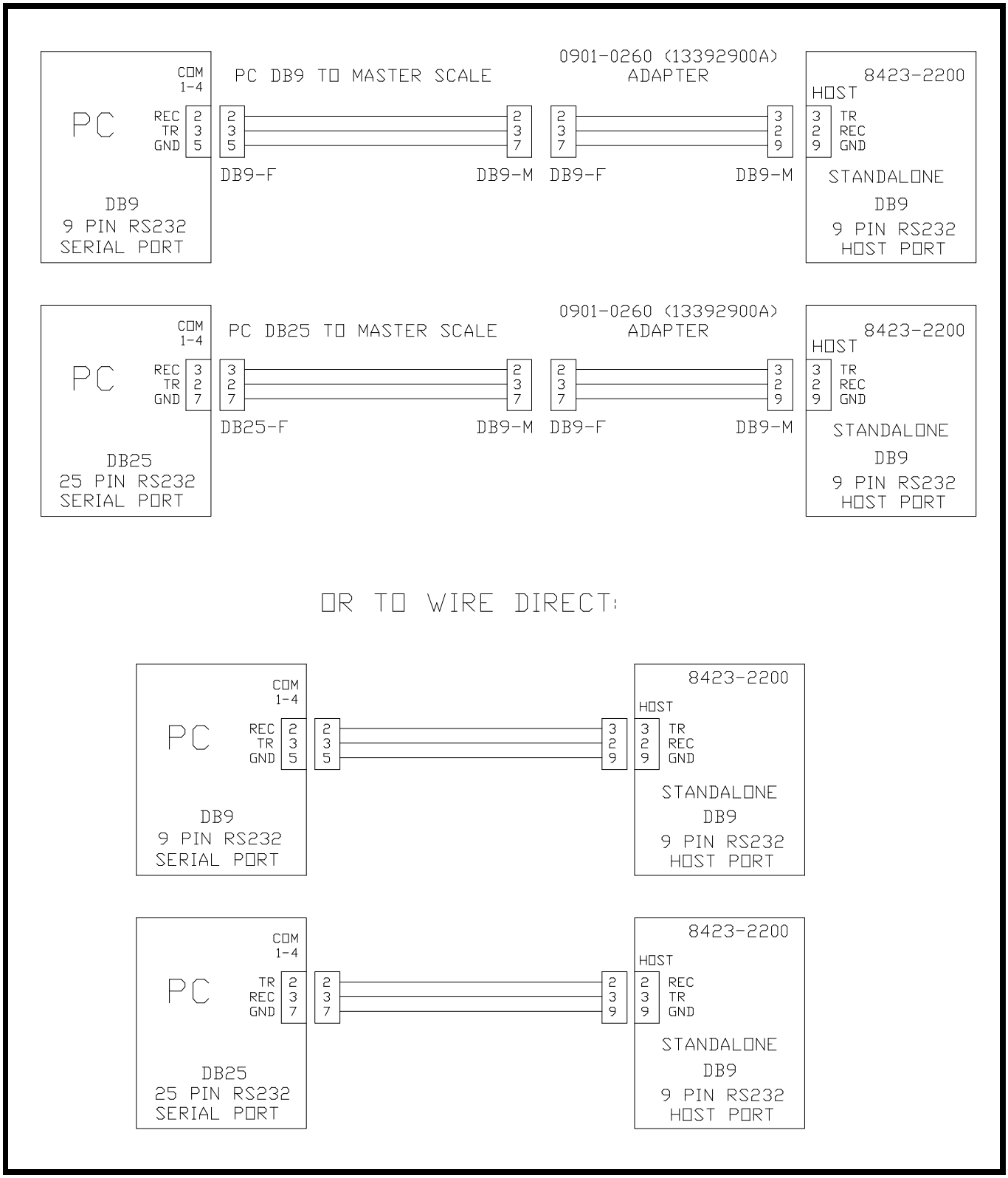
SINGLE MASTER SCALE TO PC



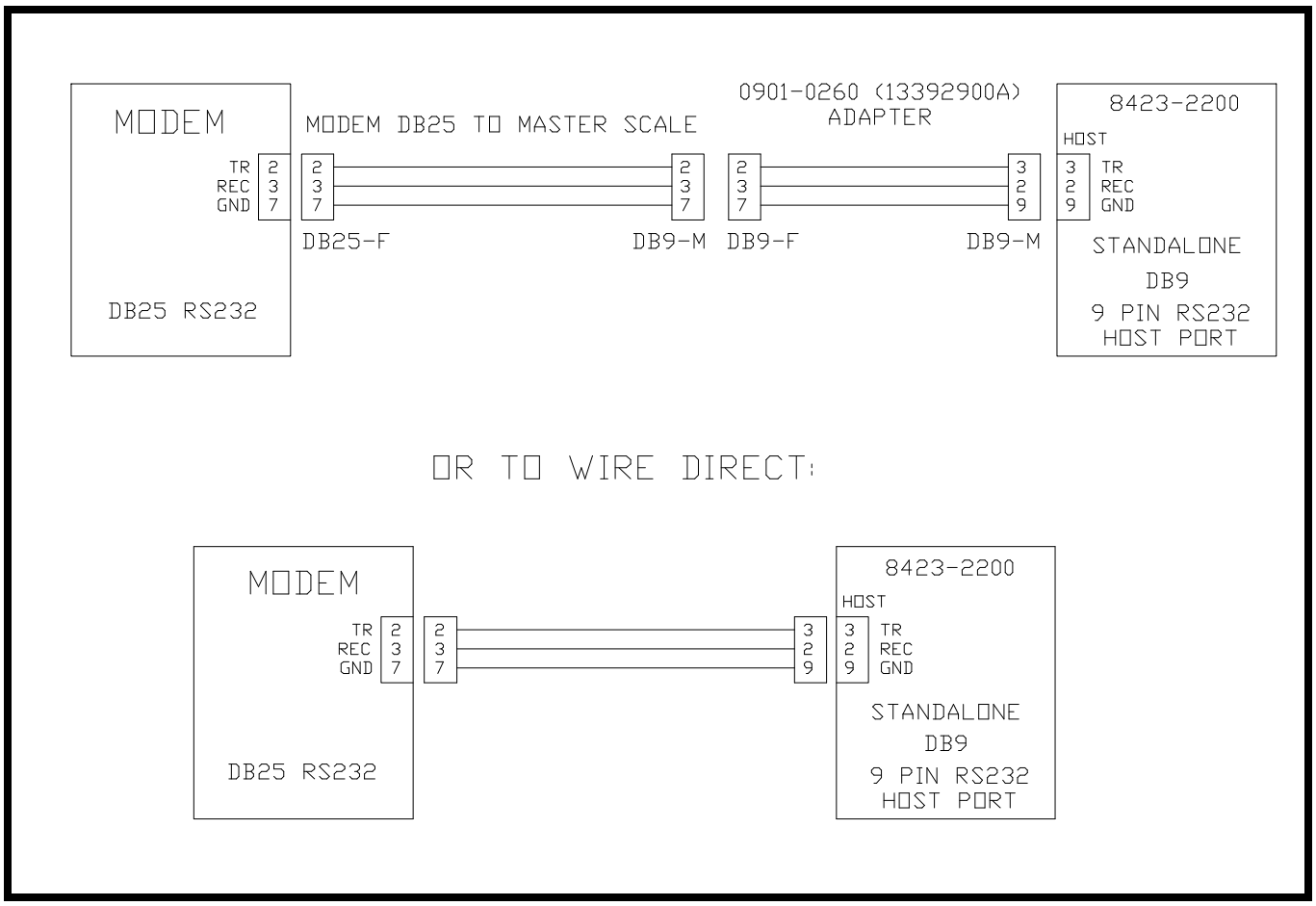
SINGLE MASTER SCALE TO MODEM



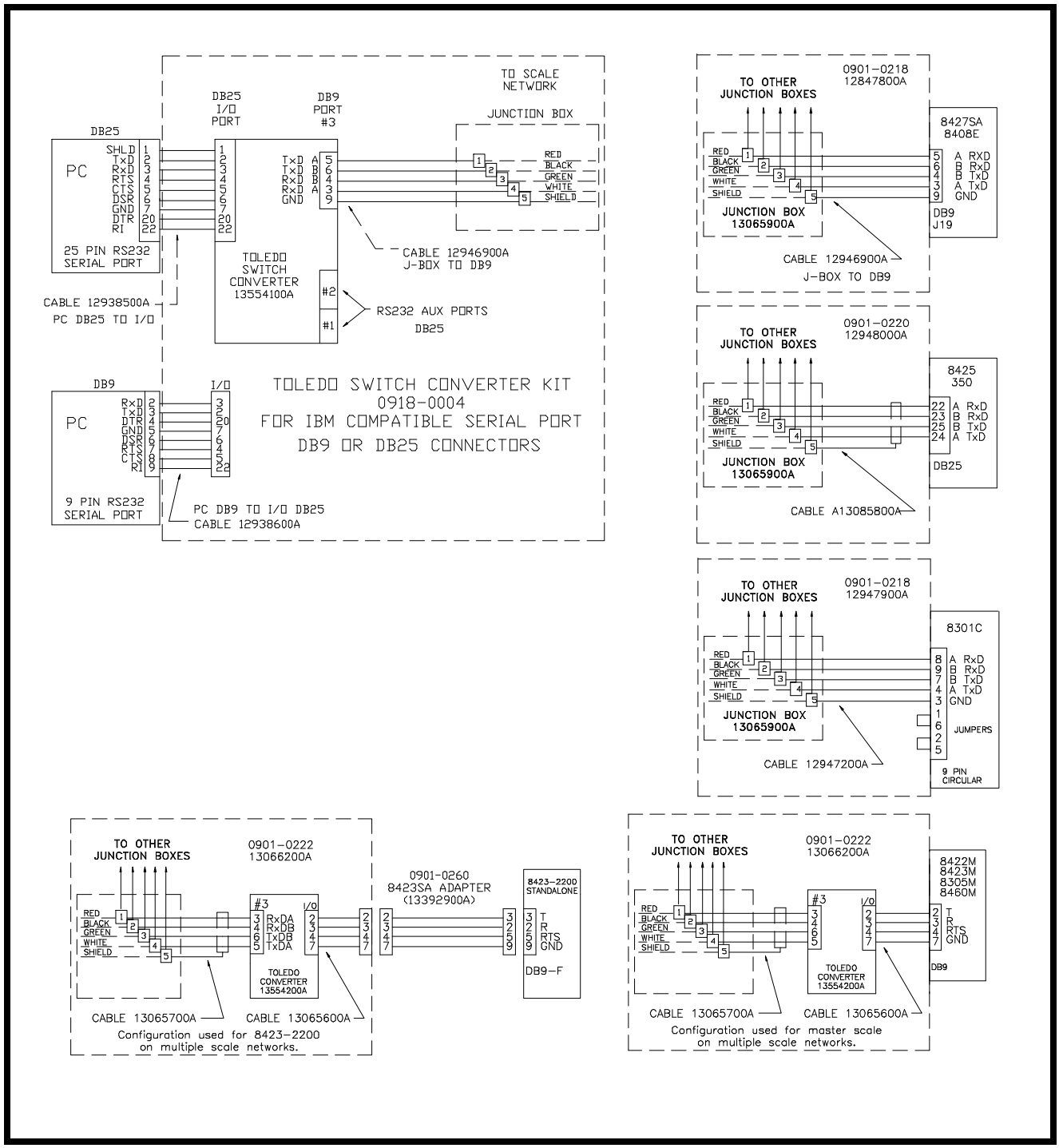
8423-2200 to PC



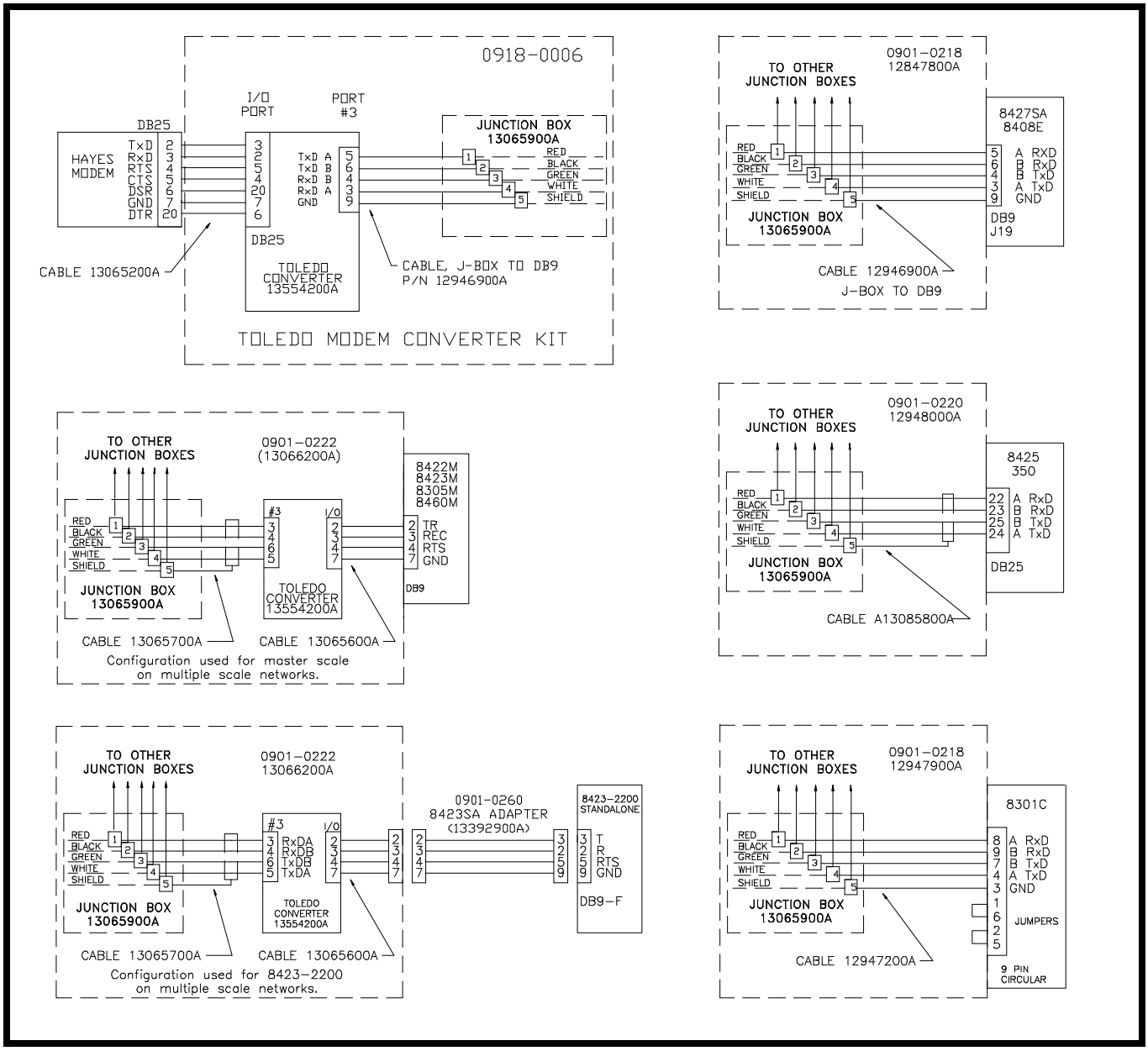
8423 TO MODEM



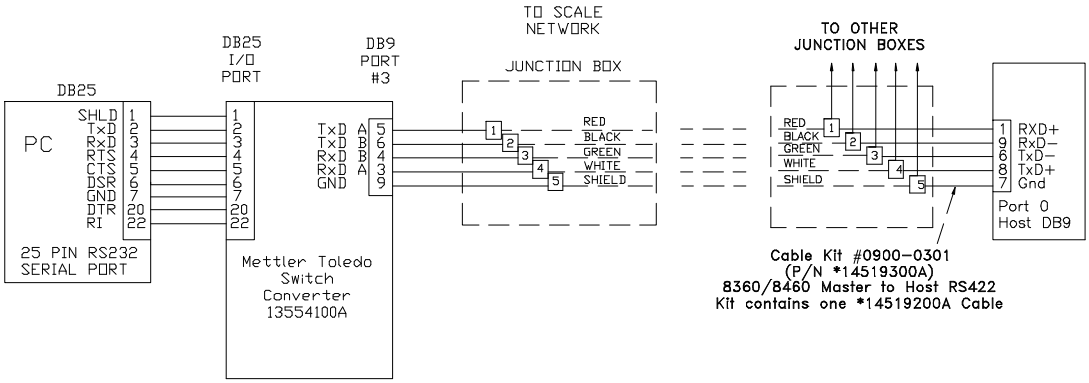
LOCAL SCALE NETWORK

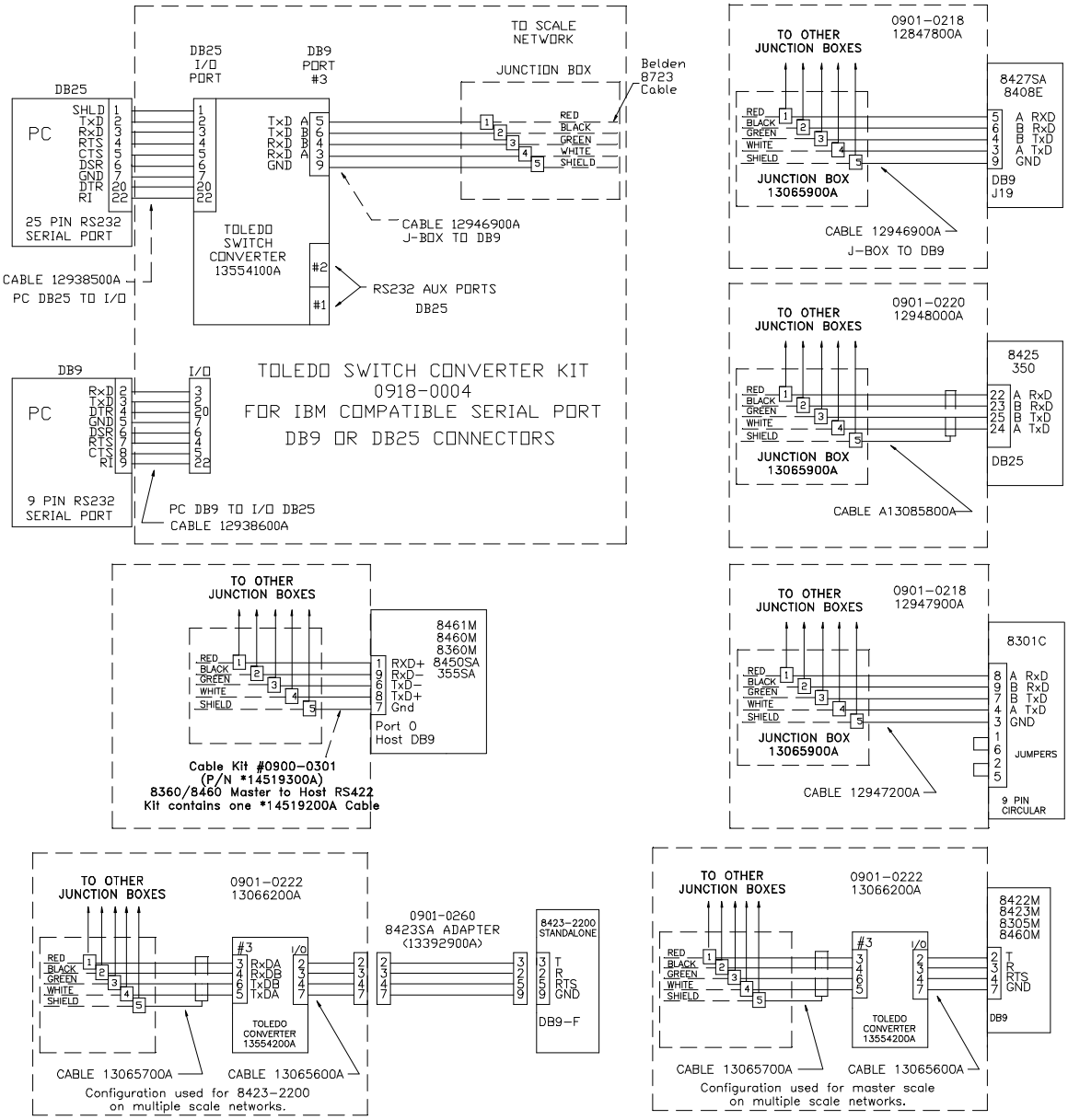


REMOTE STORE SCALE NETWORK



Type 9 Scale to Host


TO SCALE
NETWORK
DB25
I/O
PORT
DB9
PORT
#3
JUNCTION BOX
TO OTHER
JUNCTION BOXES
DB25
PC
SHLD 1
TxD 2
RxD 3
RTS 4
CTS 5
DSR 6
GND 7
DTR 20
RI 22
25 PIN RS232
SERIAL PORT
1
2
3
4
5
6
7
20
22
TxD A 5
TxD B 6
RxD B 4
RxD A 3
GND 9
Mettler Toledo
Switch
Converter
13554100A
RED
BLACK
GREEN
WHITE
SHIELD
1 RXD+
9 RxD−
6 TxD−
8 TxD+
7 Gnd
Port 0
Host DB9
Cable Kit #0900-0301
(P/N *14519300A)
8360/8460 Master to Host RS422
Kit contains one *14519200A Cable


TO SCALE NETWORK
DB25 I/O PORT
DB9 PORT #3
JUNCTION BOX
Belden 8723 Cable
DB25
PC
SHLD 1
TxD 2
RxD 3
RTS 4
CTS 5
DSR 6
GND 7
DTR 20
RI 22
25 PIN RS232 SERIAL PORT
TxD A 5
TxD B 6
RxD B 4
RxD A 3
GND 9
RED
BLACK
GREEN
WHITE
SHIELD
CABLE 12946900A J-BOX TO DB9
TOLEDO SWITCH CONVERTER 13554100A
#2
#1
RS232 AUX PORTS DB25
CABLE 12938500A PC DB25 TO I/O
DB9
I/O
PC
RxD 2
TxD 3
DTR 4
GND 5
DSR 6
RTS 7
CTS 8
RI 9
9 PIN RS232 SERIAL PORT
PC DB9 TO I/O DB25 CABLE 12938600A
TOLEDO SWITCH CONVERTER KIT
0918-0004
FOR IBM COMPATIBLE SERIAL PORT
DB9 OR DB25 CONNECTORS
TO OTHER JUNCTION BOXES
0901-0218
12847800A
8427SA
8408E
5 A RXD
6 B RxD
4 B TxD
3 A TxD
9 GND
DB9
J19
JUNCTION BOX 13065900A
CABLE 12946900A J-BOX TO DB9
TO OTHER JUNCTION BOXES
0901-0220
12948000A
8425
350
22 A RxD
23 B RxD
25 B TxD
24 A TxD
DB25
JUNCTION BOX 13065900A
CABLE A13085800A
TO OTHER JUNCTION BOXES
8461M
8460M
8360M
8450SA
355SA
1 RXD+
9 RxD-
6 TxD-
8 TxD+
7 Gnd
Port 0
Host DB9
Cable Kit #0900-0301
(P/N *14519300A)
8360/8460 Master to Host RS422
Kit contains one *14519200A Cable
TO OTHER JUNCTION BOXES
0901-0218
12947900A
8301C
8 A RxD
9 B RxD
7 B TxD
4 A TxD
3 GND
1
6
2
5
JUMPERS
9 PIN CIRCULAR
JUNCTION BOX 13065900A
CABLE 12947200A
TO OTHER JUNCTION BOXES
0901-0222
13066200A
#3
I/O
3 RxDA
4 RxDB
6 TxDB
5 TxDA
2
3
4
7
TOLEDO CONVERTER 13554200A
0901-0260
8423SA ADAPTER
(13392900A)
8423-2200 STANDALONE
3 T
2 R
5 RTS
9 GND
DB9-F
CABLE 13065700A
CABLE 13065600A
Configuration used for 8423-2200 on multiple scale networks.
TO OTHER JUNCTION BOXES
0901-0222
13066200A
8422M
8423M
8305M
8460M
2 T
3 R
4 RTS
7 GND
DB9
TOLEDO CONVERTER 13554200A
CABLE 13065700A
CABLE 13065600A
Configuration used for master scale on multiple scale networks.